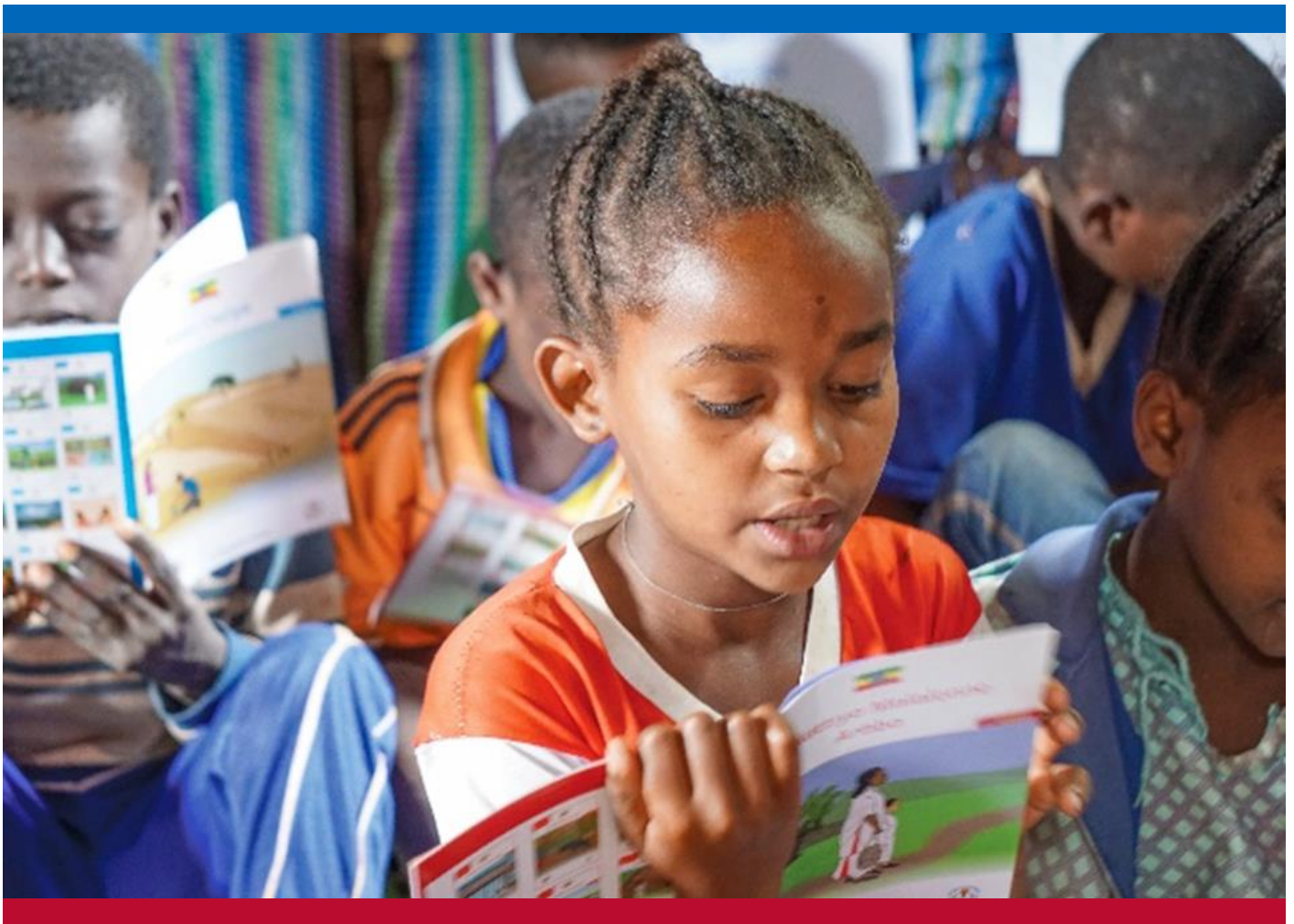




Handbook on Language of Instruction Issues in Reading Programs

A Global Reading Network Resource



NOVEMBER 2019

This resource was made possible by the support of the American people through the United States Agency for International Development (USAID). This resource was prepared for USAID's Building Evidence and Supporting Innovation to Improve Primary Grade Reading Assistance for the Office of Education (E3/ED), University Research Co., LLC, Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T.



Cover photo:

*A girl practices reading using materials
developed through Ethiopia READS II (USAID).*

Credit:

Berihun Ali, Creative Associates International





Handbook on Language of Instruction Issues in Reading Programs

A Global Reading Network Resource

Alison Pflepsen

With Amy Pallangyo

Rights and Permissions

Except as otherwise noted, *Handbook on Language of Instruction Issues in Reading Programs* is licensed under the Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International License (CC BY-NC-SA 4.0). To view a copy of this license, visit <https://creativecommons.org/licenses/by-nc-sa/4.0/>.

Under the Creative Commons Attribution-NonCommercial-ShareAlike license, you are free to share and adapt the material in any medium or format under the following conditions:

Attribution: You must give appropriate credit, provide a link to the licensed material and indicate if changes were made. You may do so in any reasonable manner, but not in any way that suggests the licensor endorses you or your use. A suggested citation appears at the bottom of this page, and please also note: *This document was developed by Reading within Reach, through the support of the U.S. Agency for International Development (USAID) and licensed under the Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International License.*

Non-Commercial: You may not use the material for commercial purposes.

Translations: If you create a translation of this work, please add the following disclaimer along with the attribution: *This translation was not created by USAID and should not be considered an official USAID translation. USAID shall not be liable for any content or error in this translation.*

Adaptations: If you create an adaptation of this work, please add the following disclaimer along with the attribution: *This is an adaptation of an original work by USAID. Views and opinions expressed in the adaptation are the sole responsibility of the author or authors of the adaptation and are not endorsed by USAID.*

Third-Party Content: USAID does not necessarily own each component of the content contained within the work. USAID therefore does not warrant that the use of any third party–owned individual component or part contained in the work will not infringe on the rights of those third parties. The risk of claims resulting from such infringement rests solely with you. If you wish to reuse a component of the work, it is your responsibility to determine whether permission is needed for that reuse and to obtain permission from the copyright owner. Examples of components can include, but are not limited to, tables, figures or images.

Disclaimer: The views expressed in this publication do not necessarily reflect the views of the United States Agency for International Development.

Suggested citation: Pflepsen, Alison, with Amy Pallangyo. *Handbook on Language of Instruction Issues in Reading Programs*. A Global Reading Network Resource. Prepared by University Research Co., LLC. (URC) under the Reading within REACH initiative for USAID’s Building Evidence and Supporting Innovation to Improve Primary Grade Assistance for the Office of Education (E3/ED). Chevy Chase, MD: URC, 2019. www.edu-links.org

Table of Contents

ACRONYMS	V
GLOSSARY OF TERMS.....	VI
ACKNOWLEDGMENTS	IX
EXECUTIVE SUMMARY.....	1
INTRODUCTION.....	4
1. WHY LANGUAGE IS CRITICAL TO LEARNING	9
1.1 Why language matters for reading improvement globally.....	9
1.2 Benefits of instruction in familiar languages.....	11
1.3 Factors to consider when addressing language issues.....	13
2. EFFECTIVE READING AND LANGUAGE INSTRUCTION – WHAT WORKS?.....	17
2.1 Key requirements for successful language and reading instruction.....	18
2.2 What we know about learning a first language	20
2.3 What we know about learning to read in a first language	20
2.4 What we know about learning to read in an additional language.....	23
2.5 What we know about effective approaches to language of instruction.....	26
3. PLANNING FOR LANGUAGE USE – ISSUES TO CONSIDER AND ACTIONS TO TAKE.....	31
3.1 Foundational Planning.....	33
3.1.1 Engage and involve diverse stakeholders.....	34
3.1.2 Provide stakeholders with learning opportunities to build capacity and leadership.....	36
3.1.3 Conduct a situational analysis and gather information focused on language.....	37
3.1.4 Incorporate language issues into work plans and budgets.....	39
3.1.5 Conduct a language mapping exercise	40
3.1.6 Conduct language analysis and support language standardization.....	42
3.1.7 Identify languages to be used for reading instruction	46
3.2 Instruction and Assessment.....	49
3.2.1 Analyze current curriculum, instructional approach and delivery.....	50
3.2.2 Analyze language to inform instructional approach.....	50
3.2.3 Develop (or modify) reading curriculum and instructional approach	52
3.2.4 Develop an evidence-based approach to support bi- and multilingual reading and language instruction.....	54
3.2.5 Develop approach to instruction for multilingual classrooms.....	57
3.2.6 Align assessments to the languages, curriculum and instructional approach	59
3.3 Resources for Teaching and Learning.....	61
3.3.1 Inventory and assess quality of existing materials.....	62

3.3.2	Develop a plan for resource production	63
3.3.3	Engage and build the capacity of materials development team.....	65
3.3.4	Develop language-specific resources.....	66
3.3.5	Openly license materials and share online to increase access.....	71
3.3.6	Consider cost and supply chain issues to support expansion and sustainability	72
3.4	Teachers and Teaching.....	74
3.4.1	Assess teacher language proficiency, knowledge, skills and beliefs.....	75
3.4.2	Incorporate language issues into teacher professional development.....	77
3.4.3	Provide teachers with resources in the appropriate languages.....	78
3.4.4	Provide professional development opportunities for administrators, teacher educators and other key stakeholders and clarify roles for reform.....	79
3.4.5	Provide opportunities for teachers to strengthen their language and literacy skills	79
3.4.6	Review and improve teacher school placement policies and practices.....	80
3.5	Communication, Advocacy and Support.....	83
3.5.1	Develop and implement a communications and advocacy strategy	83
3.5.1	Engage stakeholders to support children’s reading and language acquisition outside of school	86
3.6	Monitoring, Evaluation, Research and Learning (MERL)	87
3.6.1	Develop a comprehensive, appropriate approach to MERL.....	88
3.6.2	Conduct research to inform and evaluate approach.....	92
3.6.3	Disaggregate results by language and other characteristics.....	95
3.6.4	Assess and report language and language skills appropriately.....	96
3.6.5	Use MERL findings to modify and improve what is being done.....	96
3.7	Policies, Standards and Plans.....	98
3.7.1	Review education policies and plans through the lens of language	99
3.7.2	Conduct pilot studies and research to inform changes to language-related policies, practices and plans.....	100
3.7.3	Modify existing policies and plans to address language issues and improve reading outcomes.....	103
3.7.4	Develop language-specific standards and benchmarks	103
3.7.5	Develop a plan for reading/foundational skills improvement that includes a focus on language	105
4.	KEY TAKEAWAYS ON LANGUAGE, LITERACY AND LEARNING.....	108
	REFERENCES	110

Figures

Figure 1.	Core components of successful reading programs: Language issues to be addressed	8
Figure 2.	Research on language, literacy and learning: What we know.....	18
Figure 3.	Common Underlying Proficiency (CUP) for language acquisition	25
Figure 4.	Common approaches to language of instruction.....	29
Figure 5.	Aspects of a language-specific situational analysis: Key information to gather.....	39

Textboxes

Textbox 1.	The learning crisis: Contributing factors.....	6
Textbox 2.	Conflict and language of instruction: Unpacking myths and assumptions.....	14
Textbox 3.	Factors to consider for trilingual instruction	57
Textbox 4.	Language and teacher recruitment and placement.....	81
Textbox 5.	Setting comparable standards for literacy: The Global Proficiency Framework.....	104

Tables

Table 1.	Benefits of instruction in languages children speak, use and understand	11
Table 2.	Checklist of conditions for successful reading instruction and learning.....	32
Table 3.	Stakeholders to engage and involve in language-related planning.....	35
Table 4.	Language mapping: Information to gather, how to use it, and examples from practice	40
Table 5.	Issues to consider when developing a plan and budget for materials development	64
Table 6.	Language-related knowledge and skills teachers need to be effective.....	78

Examples from practice

Example from practice 1.	Collaborating with government on language issues: Reflections from three reading programs.....	36
Example from practice 2.	Understanding and addressing political realities in Nepal to inform reading program design.....	37
Example from practice 3.	Language mapping to inform reading program design and implementation	42
Example from practice 4.	Analyzing language dialects to improve reading instruction and outcomes in Madagascar	44
Example from practice 5.	Orthography standardization: A critical step to providing L1-based instruction in Uganda.....	45
Example from practice 6.	When there is no road map: Identifying an approach to teaching alpha-syllabic scripts in Ethiopia and Nepal.....	51
Example from practice 7.	Focusing on orthography to improve instruction: The case of Cambodia.....	53
Example from practice 8.	Developing an appropriate instructional approach for Ghanaian languages.....	54
Example from practice 9.	Supporting reading acquisition across languages: Bridging in the Philippines.....	56

Example from practice 10.	Piloting an approach to teaching second language learners of Lao.....	59
Example from practice 11.	Reviewing existing materials: An example from Nigeria.....	63
Example from practice 12.	Technology to support resource development: Bloom and Enabling Writers.....	66
Example from practice 13.	Transforming language policy into practice by improving the book supply chain and local capacity: The case of Ethiopia.....	68
Example from practice 14.	Processes, tools and lessons learned from developing materials in 11 languages in Ghana.....	69
Example from practice 15.	Understanding teacher knowledge, skills, practices and beliefs to inform reading program design and delivery.....	77
Example from practice 16.	Providing professional development for teacher educators and others through graduate-level coursework in Nigeria.....	80
Example from practice 17.	Changing caregiver beliefs and behaviors around reading: The case of Senegal.....	85
Example from practice 18.	Building local capacity in LAC to improve communications and advocacy about reading and indigenous languages.....	86
Example from practice 19.	Measuring cost-effectiveness of L1-based instruction: Kenya.....	92
Example from practice 20.	Bilingual learning trajectories: An assessment from Guatemala.....	95
Example from practice 21.	Assessing a trilingual approach to literacy and learning: Findings from the Philippines.....	97
Example from practice 22.	Improving primary grade reading: A catalyst for reflection on LOI policy and practice in Ghana.....	100
Example from practice 23.	Building a case for L1-based instruction: The case of Mozambique.....	102

Annexes

Annex A.	Advantages of instruction in languages children speak, use and understand: A summary of the evidence.....	127
Annex B.	Myths and assumptions about L1-based multilingual education.....	134
Annex C.	Resources for planning for language use in education.....	138
Annex D.	Conducting a language-specific situation analysis: Key steps to take and information to gather.....	157
Annex E.	Language mapping experiences.....	164
Annex F.	Understanding teachers' knowledge, skills and practices related to language.....	168
Annex G.	Materials development process map.....	171
Annex H.	Lesson plan template – Example 1.....	175
Annex I.	Lesson plan template – Example 2.....	178
Annex J.	Peer review checklist to support materials development.....	180

Acronyms

Descriptions of select acronyms can be found in the Glossary of Terms.

ADEA	Association for Development of Education in Africa
DEC	Development Experience Clearinghouse
CUP	Common Underlying Proficiency
EGR	early grade reading
EGRA	Early Grade Reading Assessment
FOI	fidelity of implementation
GPF	Global Proficiency Framework
GRN	Global Reading Network
L1, L2, Lx	first language, second language, additional language
LAC	Latin America and the Caribbean
LOI	language of instruction
LWC	language of wider communication
MERL	monitoring, evaluation, research and learning
MTB-MLE	mother tongue-based multilingual education
PIRLS	Progress in International Reading Literacy Study
PRIMR	Primary Math and Reading Initiative (Kenya)
RARA	Reading and Access Research Activity (Nigeria)
REACH	Reading within Reach
READ TA	Reading for Ethiopia's Achievement Developed, Technical Assistance (project)
SACMEQ	Southern and Eastern Africa Consortium for Monitoring Educational Quality
SDG	Sustainable Development Goals
TIMSS	Trends in International Mathematics and Science Study
TLMs	teaching and learning materials
URC	University Research Co., LLC
USAID	United States Agency for International Development
UNESCO	United Nations Educational, Scientific, and Cultural Organization
UNICEF	United Nations Children's Fund

Glossary of Terms

This glossary highlights terms frequently used in this resource. The terms are not listed alphabetically, but in an order related to their meaning. Descriptions of additional terms are included within the document, along with resources for more information.

Literacy is defined by UNESCO as the ability to identify, understand, interpret, create and communicate, using printed and written materials associated with varying contexts. This definition further notes that “literacy involves a continuum of learning in enabling individuals to achieve their goals, to develop their knowledge and potential, and to participate fully in their community and wider society.”¹

Reading is the process of making meaning from print. Reading requires being able to: decode and identify words (word recognition), construct meaning from them (comprehension), and coordinate word identification and meaning making so reading is automatic and accurate (fluency).² USAID-supported programs generally focus on improving reading, writing, listening and speaking skills, as well as communication via sign language. The terms literacy and reading are used interchangeably in this resource.

A **first language**, abbreviated as **L1**, is the first language a child learns for communication. A person can have more than one L1 if raised in a bilingual household. A person’s L1 can be used for different purposes at different times, and a person’s proficiency in an L1 may change over time. Children who are deaf or hard of hearing may use signed or visual language as their L1, though the way in which they acquire it may differ from how their non-deaf peers acquire an L1 that is communicated orally.

An L1 is also frequently referred to as the **mother tongue**, even if the language is learned from the father or other caregiver.

The term **home language** is used to describe languages children learn and use at home, usually their L1. For the purposes of consistency and gender neutrality, the terms L1 and home language are used in this resource.

The term **familiar language** is used in this resource to refer to a language a child is able to use and understand comfortably. Usually, a familiar language is a L1 or home language. However, in some bilingual and multilingual contexts, a familiar language might be a language frequently spoken in the child’s environment (e.g., a language children use on the playground or one that is used for wider communication within a multilingual community) and may be considered a second or additional language. The term is used in the context of reading programs to indicate that the language(s) used for instruction may not always be children’s L1, but may be languages that children use and with which they are familiar.

A **second language**, abbreviated as **L2**, is a language a person learns in addition to a first language. (**Lx** refers to a third or additional language). An L2 may be learned informally or formally. A person who is frequently exposed to an L2 may become highly proficient in the language, or bilingual. A person who is infrequently exposed to an L2 may not

¹ Silvia Montoya, “Defining Literacy,” presentation at the GAML Fifth Meeting, Hamburg, Germany: UNESCO, 2018.

² This definition is adapted from the article “What is Reading?” published by the organization Reading Rockets.

become fluent in it, and the language may function more as a foreign language. Proficiency in a second language can change over time, and its use may vary depending on the context and purpose of communication.

A **foreign language** is a language not widely spoken and used in a person's immediate environment. A language's distinction as a foreign language may change within a country, depending on how widely it is spoken, used and understood in a given community. For example, in many rural areas in sub-Saharan Africa, former colonial languages such as French and English can be considered foreign languages since they are not widely spoken or used by the general population, especially in the home environment.

A person who is **bilingual** is able to speak (or use, in the case of sign language) and understand two languages. Those who can speak, use and understand three or more languages are **multilingual**.

A **local language** is the language most commonly used in a community. Some local languages also function as languages of wider communication and may be used by millions of people across a large geographic area, including across country borders (e.g., Hausa and Kiswahili in sub-Saharan Africa). Therefore, the designation of a language as "local" does not indicate how widespread its use may be.

A **language of wider communication (LWC)**, also known as a **lingua franca**, is a language used as a common means of communication by speakers/users of different languages. For some, an LWC will be their L1, while for other speakers it will be an additional language. For example, in Kenya, Kiswahili is considered an LWC, though it is a L1 for some people and an L2 in Kenya. LWCs can be used within a small or large geographic area and may be used across national borders. (Cross-national LWCs may have different names and orthographies. For example, the language known as ciNyanja in Mozambique is the same as the language known as Chichewa in Malawi.)

Many countries have designated **national and official languages**. National languages are usually indigenous to the country (e.g., Lingala, Kiswahili, Ciluba and Kituba are the four national languages of the Democratic Republic of the Congo).

Countries frequently designate **official languages** for use in government and the education system, codifying their use in the Constitution or official policy documents. In many countries, both national languages and former colonial languages are designated as official languages. Specific criteria may exist for a language to be designated as a national and/or official language.

The term **dominant language** is used to describe a language spoken and used by the ethnic, cultural or social group with the most power or influence in a particular area. This term is sometimes applied to languages that are spoken by the majority ethnic group in a country, such as Khmer in Cambodia. The term dominant language can also be used for languages not spoken by a majority of the population if the languages carry a certain prestige or official status.

The term **non-dominant language (NDL)** refers to a language that does not have official recognition or is considered of lesser status vis-à-vis a dominant language. NDLs may be minority languages in some contexts, while in others they may be spoken by a large population.

Language of instruction (LOI) refers to the language used for teaching the curriculum in an educational setting. This term is used interchangeably in most literature with *medium of instruction (MOI)*; for consistency, the term LOI is used in this resource.

Mother tongue-based multilingual education (MTB-MLE) is a term used to describe a systematic approach to learning that emphasizes the use of learners' L1 to teach initial literacy, curricular subjects and other languages. Additional languages (L2 or Lx) are gradually integrated into teaching and learning through an additive approach to language of instruction, with the goal of children becoming bilingual/multilingual. MTB-MLE emphasizes the use of the L1 as both a medium and as a subject of instruction to build a strong cognitive foundation that will support the learning and use of additional languages, and of academic content.

An orthography is how the sounds of a language are represented in written form. An orthography includes symbols, punctuation, decisions about word breaks and other features. Orthographies can be characterized as **transparent** or **opaque** depending on the degree of sound-symbol correspondence. In transparent orthographies, a one-to-one correspondence exists between symbols (e.g., letters or graphemes) and sounds, while in opaque orthographies a sound may be represented in multiple ways.

Interlinguistic transfer is the process of applying literacy skills, such as visual awareness, phonemic awareness and comprehension, from one language to another. Transfer is multi-directional, but the most efficient direction is from the L1 to an additional language.

A **dialect** is a particular form of a language, often spoken in a specific geographic area and/or by a specific ethnic or social group. It can be distinguished from other varieties of a language by its unique vocabulary, grammar and pronunciation.

For definitions and explanations of additional terms related to language, reading and literacy, consult the following resources:

International Literacy Association's Literacy Glossary: <https://www.literacyworldwide.org/get-resources/literacy-glossary>

SIL's Glossary of Linguistic Terms: <https://glossary.sil.org/>

Acknowledgments

The *Handbook on Language of Instruction to Support Reading Improvement* was prepared by Reading within Reach (REACH), a five-year initiative funded by the U.S. Agency for International Development (USAID) and implemented by University Research Co., LLC (URC). The purpose of REACH is to support those designing and implementing early grade reading initiatives in low- and middle-income contexts by providing resources and professional development opportunities; supporting innovations in early grade reading programming; and supporting the Global Reading Network, a community of practice that brings together practitioners, government and nongovernmental organizations, civil society groups and other stakeholders.

The *Handbook on Language of Instruction to Support Reading Improvement* was authored by Alison Pflepsen, REACH Reading Program Specialist, with support from Amy Pallangyo, technical consultant to REACH. The resource builds on the guidance provided in *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes*, a resource produced by RTI International in 2016 through the Education Data for Decision-making (EdData) II mechanism. John Micklos edited the document.

REACH extends its sincere appreciation to Rebecca Rhodes, USAID's Reading Team Lead, for her stewardship of the resource's production and for her insights and suggestions regarding its content. We also thank Eirini Gouleta, formerly of USAID, for her advocacy on behalf of language issues and the development of this resource.

REACH would also like to thank all who reviewed and provided feedback on a draft of the *Handbook on Language of Instruction Issues in Reading Programs*, including: Carolyn Adger, Center for Applied Linguistics (CAL); Paul Frank, SIL LEAD; Nathalie Louge and Emily Koester, FHI 360; Wendi Ralaingita, RTI International; and Megan Sutton Mercado, SIL International. Sylvia Linan-Thompson, University of Oregon, also provided helpful suggestions on key sections. The authors are also grateful for the feedback and input from USAID personnel, including: Graciela Briceno, Melissa Chiappetta, Joshua Josa, Nathaniel Haight, Rebeca Martinez, Sandy Oleksy-Ojikutu, and Nina Weisenhorn.

This resource reflects the experiences and lessons learned from recent and current early grade reading programs. REACH would like to thank the following individuals in particular for sharing reports, articles, conference presentations and photographs that were integrated into this resource:

American Institutes for Research (AIR): Ana Gonzalez, Pooja Nakamura, Rebecca Stone

Florida State University (FSU): Adrienne Barnes

Creative Associates International: Corrie Blankenbeckler, Joanie Cohen Mitchell, Jordene Hale

Education Development Center, Inc. (EDC): Susan Bruckner, Mary Sugrue

RTI International: Margaret (Peggy) Dubeck, Wendi Ralaingita

SIL International & SIL LEAD: Paul Frank, Megan Sutton Mercado, Leila Schroeder, Barbara Trudell & Agatha van Ginkel

FHI 360: Nathalie Louge, Emily Koester, Emily Miksic, Mackenzie Matthews

Room to Read: Christabel Pinto

REACH greatly appreciates these individuals' time and willingness to share their knowledge, experiences and resources with the Global Reading Network. We also appreciate the contributions of any person whose name may have been inadvertently omitted from this list.

Executive Summary

Language plays a critical role in achieving USAID's education priorities and global commitments to provide *all* children with access to a quality education. Appropriate use of language in education is fundamental to effective reading and literacy instruction, and teaching and learning across the curriculum. Without attention to language issues, equitable, meaningful and sustainable improvement of children's literacy and learning outcomes cannot happen.

The *Handbook on Language of Instruction Issues in Reading Programs* aims to support governments, USAID and other donors, and the many organizations, institutions and individuals collaborating to improve literacy and learning in low-income countries by providing them with information, guidance and resources to understand and address language issues in their primary grade literacy programs.

Developed to reflect USAID's Education Policy priorities, the resource emphasizes the need to use evidence to drive decision-making; to develop approaches that measurably and sustainably improve learning and education outcomes; to strengthen local systems and institutions; and to promote equity and inclusion in all aspects of the work. To support their work, readers will find in the *Handbook*:

- **A summary of evidence-based best practices** related to teaching and learning;
- **Guidance on issues to consider and actions to take** to effectively apply evidence and address language issues in a specific context;
- **Examples from practice** that highlight what primary grade reading programs have done to address language issues and the approaches they have used to support effective, language-specific reading instruction;
- **Resources and tools** to support language-related planning and implementation;
- **Stop and reflect activities** that individuals and program teams can do to apply information presented in this resource to their work and context;
- **Annexes** that provide more detailed information on key topics and comprehensive lists of resources.

The diversity of content in this resource is useful to those who are new to reading programming and language issues, and to those with years of experience. Programs at all stages of design, implementation and expansion can benefit from the extensive information, resources and experiences included in the *Handbook*, which is organized into three sections. A summary of each section is included below:

Section 1. Why language is critical to learning describes how evidence-based approaches to language of instruction can improve education access, equity and learning outcomes. It summarizes key factors to consider when identifying how to most appropriately and effectively use language to support quality education provision.

Section 2. Effective reading and language instruction and assessment summarizes key evidence on reading and language instruction that should inform an approach to literacy instruction, and how language is used for instruction more broadly. Key points from this section include the following:

- **Children learn to read better when they do so in their first or home language**; a strong foundation in a familiar language helps children learn additional languages.

- **Across languages, children need to learn specific literacy skills to be good readers;** differences between languages will affect the strategies used and the amount of time dedicated to teaching specific skills.
- **Teachers need to use specific strategies to teach children to read, write and use a second or additional language;** an understanding of the languages being taught and the specific context is required to develop an appropriate, effective approach for language and reading instruction.
- **Children who are deaf or hard of hearing** need to be exposed to a sign language-rich environment and a bilingual approach to literacy instruction that includes sign language and the relevant written language.
- **Continued use of children's first languages** while they are learning an additional language is the most effective approach to helping learners become strong readers in both languages; this additive approach to language of instruction is also most helpful in supporting children to learn academic content.
- **Diglossia is a common challenge in Arabic speaking countries** where Modern Standard Arabic (MSA) is used for written materials and in academic settings, but where the local dialects may differ substantially from MSA. Although diglossia is related and similar to issues faced by multilingual classrooms, it is **not addressed in this resource**.

Section 3. Planning for language use in reading programs provides guidance on language issues to consider and actions to take to design and implement an effective, contextually appropriate literacy improvement initiative. The guidance is organized into seven sections, aligned with components of successful literacy programming outlined in USAID's Reading MATTERS framework. Recommendations from across these core areas are summarized below:

- 3.1 Foundational planning.** Experience from EGR programs shows that time and money invested in understanding and planning for language issues enhance program quality, appropriateness, and effectiveness. Engaging diverse stakeholders in discussions and decision-making, conducting a language mapping exercise, analyzing the languages to be used, and incorporating language-related activities into work plans and budgets are all useful to take stock of programs at any phase of design and implementation.
- 3.2 Instruction and assessment.** To design and support effective instruction and assessment, the curriculum and strategies for teaching reading need to be language-specific and evidence-based. Assessments also need to align with the content and approach; when children are learning to read in more than one language, assessments should be designed that accurately capture learners' knowledge and skills across languages.
- 3.3 Resources for teaching and learning.** Quality teaching and learning materials in the target languages are required for successful teaching and learning. Key actions to undertake to support quality and efficient resource development and use include adapting existing resources, as appropriate; developing a plan for resource development; using existing tools (such as lesson plan templates); establishing a process for quality control; and building the capacity of individuals, organizations and institutions to support ongoing materials development, distribution and use.
- 3.4 Teachers and teaching.** Teachers are at the heart of effective reading and language instruction. Critical to supporting teachers is first understanding their language proficiency and language- and reading-related knowledge, skills and beliefs. Professional development should then explicitly address language-related aspects

of teaching and learning. Teachers may also need ongoing opportunities to strengthen their proficiency in target languages, while teacher educators and administrators will need opportunities to learn about language issues. Teacher placement in schools also needs to support “teacher-student language match.”

- 3.5 **Communication, advocacy and support.** Issues and actions related to language use for reading instruction need to be well-communicated with diverse stakeholders. Advocacy is also likely needed to bring on board certain individuals and groups who may oppose a particular approach. Parents and caregivers should also be engaged to support their children’s reading acquisition outside of school. Importantly, the capacity and commitment of government and other institutions needs to exist to sustain initiatives that are effective in improving reading outcomes.
- 3.6 **Monitoring, evaluation, research and learning.** Language-specific monitoring, evaluation and research is essential to understanding “what works” with respect to improving literacy and learning outcomes. Key steps to take to integrate language into a program’s overarching MERL plan include: Identifying language-specific issues to monitor and evaluate and incorporating them into the overall MERL plan; monitoring the fidelity and quality of implementation; measuring the cost-effectiveness of the particular approach to language of instruction for reading; and disaggregating and appropriately reporting results by language. Qualitative and quantitative research across components is also highly recommended. Programs should consult USAID’s Foundational Skills Learning Agenda and 2019 Education Indicator Guidance for additional guidance.
- 3.7 **Standards, policies and plans.** To lay the foundation for improving how language is used for literacy instruction, and for instruction more broadly, reading programs need to develop plans, support policy improvement and develop standards and benchmarks that can be used to assess and monitor progress. Specific activities to undertake include developing a plan for reading improvement that includes a focus on language; reviewing education policies through the lens of language, and working with partners to modify them as appropriate; leveraging pilot programs and research to support changes in policy and practice; and developing literacy standards (ideally using the Global Proficiency Framework, developed by UNESCO, USAID and partners, as a reference) and benchmarks to assess and monitor progress over time.

Language poses a quality, equity, and financial imperative that demands USAID and its partners take on the sometimes difficult but rewarding work of designing, implementing and evaluating research-based, contextually appropriate approaches for improving how literacy and language are taught and learned. Many approaches and solutions exist. Until *all* children are reading with comprehension and attaining meaningful literacy and learning outcomes, we all have work to do to improve language use in education.

Introduction

Why language matters

As more children gain access to school, findings from myriad learning assessments have highlighted the failure of school systems to support children's acquisition of literacy, numeracy and other critical skills.³ As of 2017, 617 million children and youth worldwide are estimated to lack basic reading and mathematics skills.⁴

While many factors contribute to this learning crisis, language is increasingly, and rightly, recognized as a key reason that millions of learners globally do not acquire the skills they need to succeed in school and in life.⁵ The problem is twofold: First, many school systems continue to use languages for instruction that children do not speak, use fluently or understand, despite the overwhelming evidence—described in this *Handbook*—of the key role that language plays in supporting effective teaching and learning.⁶ UNESCO estimates that 40 percent of the world's children do not have access to education in a language they understand.⁷

Second, education systems continue to use language for instruction in ways that are ineffective in helping children learn to read and to learn across the curriculum. This includes providing children with too few years of initial reading instruction; utilizing methodologies for teaching reading that are not evidence-based and not specific to the language being taught; lack of appropriate, high-quality instruction in second or additional languages; and inadequately supporting children's transition from one language of instruction (LOI) to another.

This failure to provide quality education in languages children speak, use and understand best—while at the same time supporting them to acquire skills in additional languages to thrive in a global society—results in billions of dollars

³ Assessments that been used to measure the scale and scope of the “learning crisis”—and in particular the fact that millions of children are not learning to read by early primary, include early grade reading assessments (EGRA) conducted as part of USAID programs, literacy assessments supported by the ASER Centre, and international assessments such as the Progress in International Reading Literacy Study (PIRLS) and those administered by the Southern and Eastern Africa Consortium for Monitoring Educational Quality (SACMEQ).

⁴ United Nations. *Quality Education: Why it Matters*. (New York: United Nations, no date).

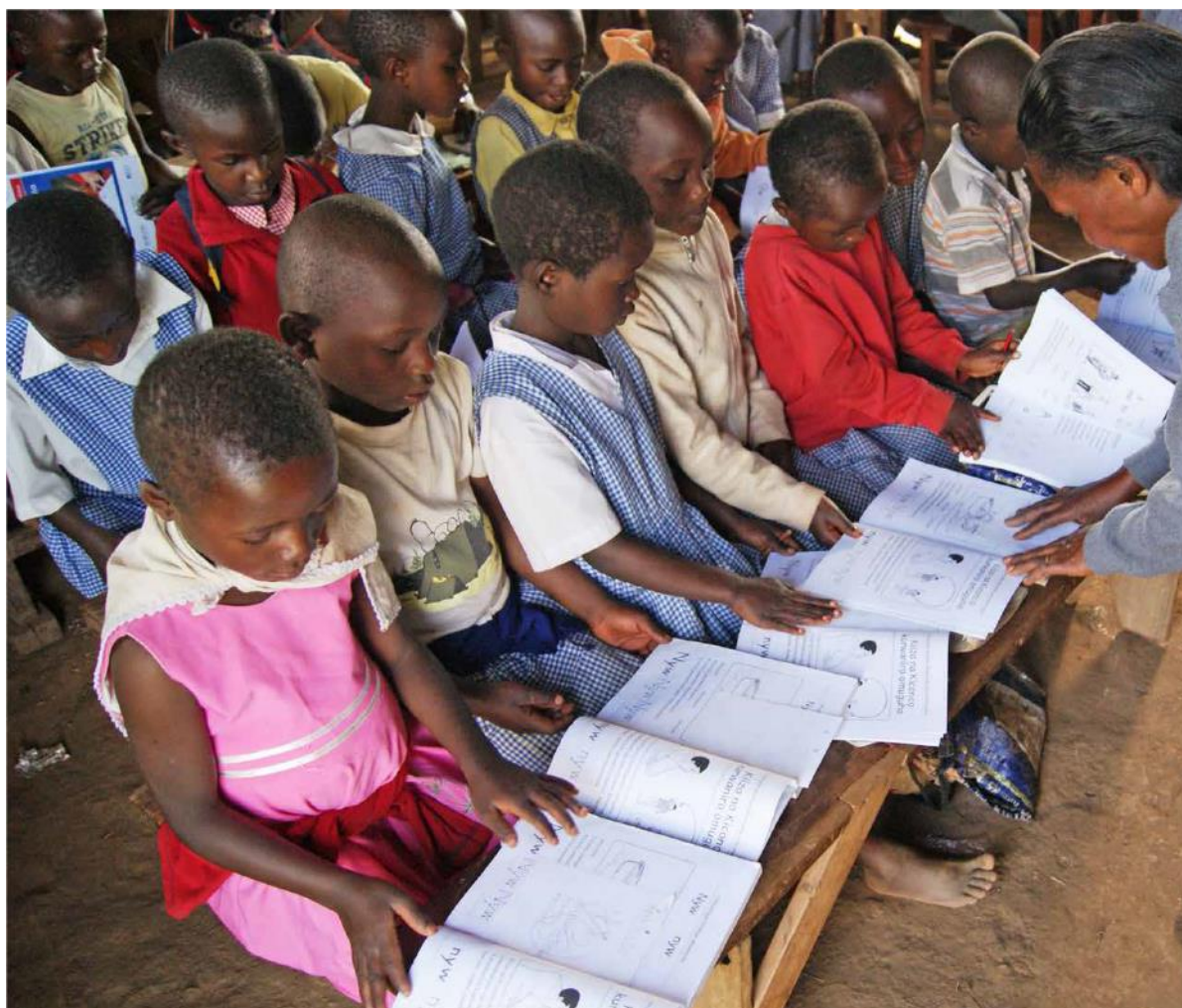
⁵ Global education institutions have long recognized the importance of language in improving education outcomes, though the focus on the “nuts and bolts” of how to improve learning in multilingual contexts has been driven by better data on children's reading outcomes and subsequent efforts to improve reading curriculum, teaching materials and teacher training. Earlier efforts to raise attention to language issues include: World Bank. *In Their Own Language...Education for All. Education Notes* (Washington, D.C.: World Bank, June 2005); UNESCO, *Mother Tongue Matters: Local Language as a Key to Effective Learning* (Paris: UNESCO, 2008); and Helen Pinnock, *Language and Education: The Missing Link. How the Language Used in Schools Threatens the Achievement of Education for All* (United Kingdom: CfBT Education Trust and Save the Children Alliance, 2009a).

⁶ This research is cited throughout this resource, as well as summarized in **Annex A, Benefits of instruction in languages children use and understand: A summary of the evidence**. For example, the Southern and Eastern Africa Consortium for Monitoring Educational Quality (SACMEQ) has identified “speaking the language of instruction” as one of seven pupil-level predictors for both reading and mathematics. Njora Hungi, *Accounting for Variations in the Quality of Primary School Education*, SACMEQ Working Paper 7 (Paris: UNESCO International Institute for Educational Planning, 2011). See also Carol Benson, “The Role of Language of Instruction in Promoting Quality and Equity in Primary Education,” in *Lessons in Educational Equality: Successful Approaches to Intractable Problems Around the World*, edited by Jody Heymann and Adele Cassola, 199–215 (New York: Oxford University Press, 2012).

⁷ UNESCO. *Mother Tongue-based Multilingual Education* [infographic]. (Bangkok, Thailand: UNESCO Asia and Pacific Regional Bureau, 2018c).

wasted across education systems, as children repeat grades, drop out or leave school without essential the literacy, numeracy and other skills needed for the 21st century workforce.⁸

Language also has profound implications for education equity. Inappropriate and ineffective approaches to language use for teaching and learning imperil the achievement of Sustainable Development Goal 4, “ensure inclusive and quality education for all and promote lifelong learning.”⁹ This is because lack of access to quality education in a familiar language disproportionately affects children who speak and use minority languages, children who are affected by conflict and crisis, and girls, who in some contexts are less likely than boys to use and understand a second or foreign language used for instruction.¹⁰ For the deaf community, the issue of language use in schools—and specifically the use of sign language—is also critical to equity in education, and a right codified in disability policy, legislation and international instruments.¹¹



⁸ See Table 1. Benefits of instruction in languages children speak, use and understand and Annex A. Advantages of instruction in languages children use and understand: A summary of the evidence for a comprehensive summary of the evidence.

⁹ United Nations, Sustainable Development Goals – Goal 4: Quality Education, no date.

¹⁰ Carol Benson, Girls, Educational Equity and Mother Tongue-based Teaching, Bangkok, Thailand: UNESCO, 2005.

¹¹ The rights of deaf people to use sign language as a “mother tongue” in the family, in the school and the wider community are codified in disability policy, legislation and international instruments. See World Federation of the Deaf (2019) for more information.

Children who do not have access to education in languages they use and understand continue to suffer from poor outcomes, as measured in numerous reading and learning assessments, due to the lack of standards-based curriculum, quality instruction and materials in those languages. Poverty also plays a role: In Africa, research has found a direct relationship between the use of former colonial languages as the language of instruction and inequity, as measured by household income.¹²

Language and USAID's Education Policy

Given the implications of language on literacy, learning and education equity, understanding and addressing language issues is central to achieving USAID's 2018 Education Policy priorities: (1) to expand access to quality education for the most marginalized and vulnerable children and youth and (2) to increase children's acquisition of literacy, numeracy and social-emotional skills.¹³ Indeed, awareness of language issues has been catalyzed in recent years by USAID's focus on improving the teaching and learning of reading. Specifically, stakeholders' attention has turned to the pressing need to improve children's and youth's *equitable* access to *quality* reading instruction in languages they speak, use and understand, while at the same time supporting their acquisition of additional languages so they have the knowledge and skills to engage and contribute in both the local and global society and economy.

As a result of primary grade reading assessment data and the experiences of reading improvement initiatives over the past few years,¹⁴ many governments, donors and the diverse organizations have come to realize the centrality of language in all aspects of reading improvement. These aspects include deciding which languages to use for literacy instruction, developing language-specific curriculum and materials, and providing teachers and educators with professional development that incorporates language issues and builds language-related knowledge and skills. While addressing language issues alone will not solve the "learning crisis" (read **Textbox 1** for a summary of contributing factors) it has become clear that language is a critical thread to improving teaching and learning, and one that, if not properly addressed, can stall efforts to improve education access, literacy and learning outcomes. This is

Textbox 1.

The learning crisis: Contributing factors

Improving how language is used throughout the education system can have significant ripple effects on improving instruction and outcomes. Yet doing so is not a panacea for solving the "learning crisis."

Other important factors affecting teaching and learning also need to be addressed. These include: poor quality of teacher preparation; insufficient teaching and learning materials; poor teacher attendance (often related to remuneration and job satisfaction) and student attendance (a function of many factors, including poverty, safety and the quality of education); the safety of the school environment, particularly in contexts experiencing conflict and/or crisis; a child's status as having a disability; lack of capacity throughout the education system to support quality improvements; and a lack of support at home (which is in turn related to socioeconomic status). It is therefore important to keep in mind that while "getting language right" is essential to success—and cuts across many of these issues—a comprehensive approach to improving education is needed to solve the learning crisis.

¹² Gary Coyne, "Language Education Policies and Inequality in Africa: Cross-National Empirical Evidence," *Comparative Education Review* 59, no. 4 (2015): 619-637.

¹³ USAID, *USAID Education Policy* (Washington, D.C.: USAID, 2018a).

¹⁴ Two helpful summaries of progress and experiences to date are: Amber Gove, Audrey-Marie Moore, and Peggy McCardle (eds.), *Progress Toward a Literate World: Early Reading Interventions in Low- and Middle-Income Countries*. Special issue of *New Directions for Child and Adolescent Development* 155 (2007); and Matthew A. Kraft, Matthew A., David Blazar and Dylan Hogan, "The Effect of Teaching Coaching on Instruction and Achievement: A Meta-Analysis of the Causal Evidence," *Review of Educational Research* 88, no. 4 (2018).

true for programs implemented in contexts affected by conflict and crisis; for those targeted to youth; and for initiatives designed to improve teaching and learning for children with disabilities, particularly those who use sign language. Therefore, throughout this resource, the intersection between language and other critical issues that promote and support quality education is emphasized.

Still, the data and experiences from those working on the front lines of reading improvement suggest that, while many stakeholders are supporting reading instruction in languages children speak, read and understand, much more attention needs to be paid to language-specific issues to improve the quality and effectiveness of reading instruction--and instruction across the curriculum more generally.

Purpose of this resource

A lack of understanding of the myriad aspects of education that are affected by language, a lack of knowledge of what needs to be done to improve the situation, and the absence of a plan that clearly maps out the steps to take to address language-related issues have been found to be major impediments in improving literacy and learning outcomes. Indeed, many reading programs have found that a failure to adequately and holistically address language issues during the design process has led to gaps in the quality of the approach and shortcomings in improving instruction and learning.

At the same time, programs are reporting progress on important issues related to how language is used for instruction in reading programs, allowing them to pave the way for better, more effective approaches to literacy improvement. Moreover, more programs are conducting in-depth situational analyses to understand the linguistic context in which they are being implemented with the aim of modifying approaches, and improving both policy and practice as they relate to language issues in their programs.

The purpose of the *Handbook on Language of Instruction Issues in Reading Programs* therefore is to respond to the needs of the diversity of stakeholders—governments, donors and their implementing partners—for specific information and guidance on how to address language issues in their reading programs, as well as more broadly within the education system. It is also designed to support USAID's 2018 Education Policy priorities by emphasizing the need to use evidence to drive decision-making; to develop approaches that measurably and sustainably improve learning and education outcomes; to strengthen local systems and institutions; and to promote equity and inclusion.

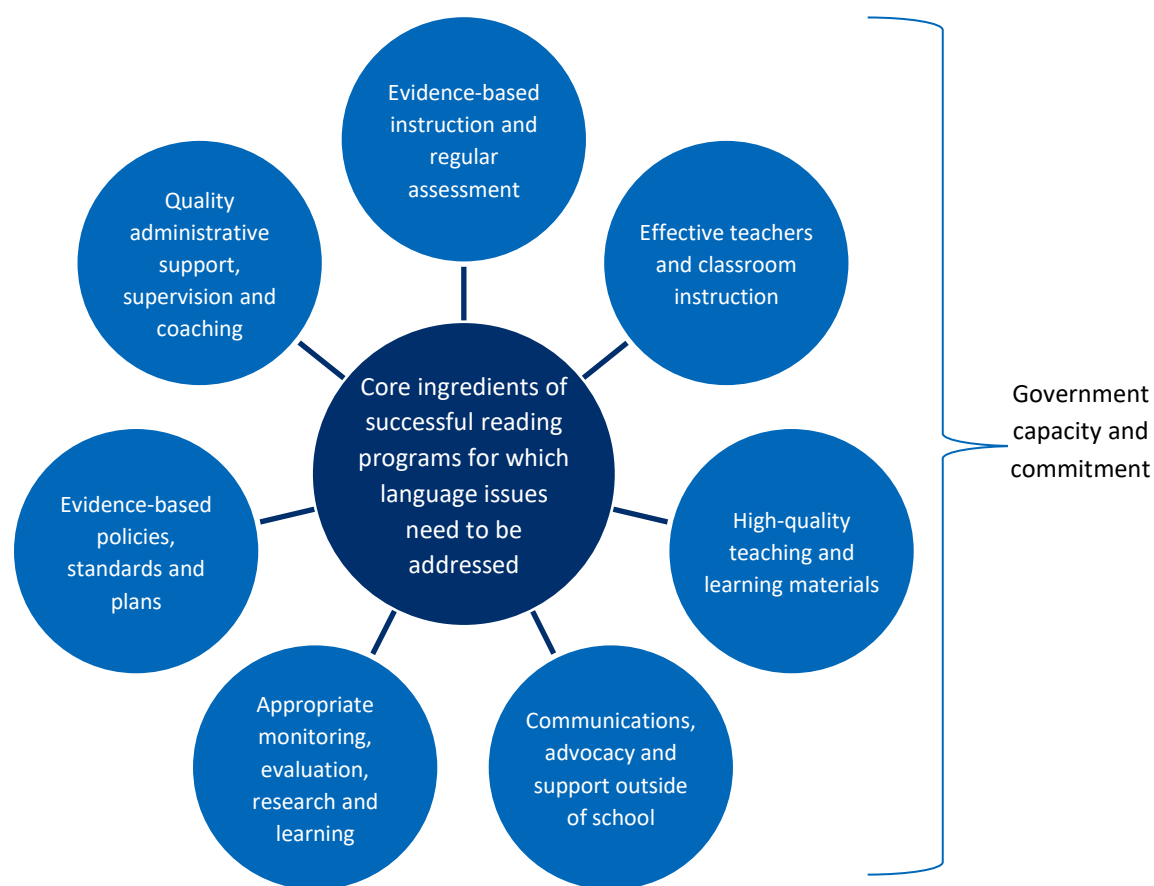
The *Handbook* is designed to be useful to anyone supporting efforts to improve literacy or learning improvement; to be applicable across geographic contexts; to be accessible to people with different levels of knowledge and experience; and to be relevant to programs in various stages of design, implementation and expansion.

1. **Why language is critical to learning** describes how evidence-based approaches to language of instruction can improve education access, equity and learning outcomes. It summarizes key factors to consider when identifying how to most appropriately and effectively use language to support quality education provision.
2. **Effective reading and language instruction and assessment** summarizes the most recent evidence on reading instruction across languages; how to support children's acquisition of a second or additional language; and issues related to transition from one language of instruction to another.
3. **Planning for language use in reading programs** provides detailed guidance on issues to consider and steps to take to effectively integrate language into the design, implementation, monitoring and evaluation of

primary grade reading initiatives and education programming more generally. Organized around the core components of successful reading improvement outlined in USAID’s Reading MATTERS Framework,¹⁵ summarized in **Figure 1**, this section includes specific recommendations, case studies and experiences from reading programs, and resources and tools that can be used to support program development, implementation, monitoring and evaluation.

As a result of engaging with the content and resources, readers should: (1) Understand the critical role that language plays in effective teaching and learning; (2) Be knowledgeable about evidence-based approaches to teaching reading and language; (3) Be aware of language issues and actions that can be taken to address them across reading program components; and (4) Be knowledgeable about resources and tools available to support their work.

Figure 1. Core components of successful reading programs: Language issues to be addressed



¹⁵ USAID, *USAID Reading MATTERS Conceptual Framework*, November 2019. These core components of successful literacy initiatives are an expanded version of the “5T’s” framework for improving early grade reading outcomes: Teaching, Text, Time, Test and Tongue, described in Amber Gove and Peter Cvelich, *Early Reading: Igniting Education for All*. A Report by the Early Grade Learning Community of Practice, Revised Edition (Research Triangle Park, NC: RTI International, 2011).

1. Why language is critical to learning

Before you begin: Pre-reading reflections

As you read this section about the importance of language for learning, keep the following guiding questions in mind:

- How are choices about language and instruction related to reading and learning achievement?
- What are some of the advantages of teaching children basic reading skills in a language they use and understand?
- What contextual factors need to be considered when making decisions about languages to be used for reading instruction?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Key ideas:

Why language is critical to learning

- ✓ Language and literacy development are inextricably related and must be considered together when making decisions about reading improvement initiatives.
- ✓ Instruction in languages that are familiar to children—the ones they speak, use and understand best—is critical to improving reading outcomes.
- ✓ Research and experience have found that learning to read in a first or home language conveys numerous benefits to children, teachers and their parents and caregivers, including helping children to learn to read more efficiently, facilitating acquisition of an additional language, and supporting children's learning in other subjects.

Understanding the social, political and educational context, as well as evidence on language acquisition, is important to inform decisions related to language and reading program planning and implementation.

1.1 Why language matters for reading improvement globally

Language and literacy go hand in hand. As children learn to use, understand, and recognize common language symbols in a language they learn first, they are developing the pre-requisite skills necessary to engage in formal literacy development. And, as emphasized in UNESCO's 2006 Global Monitoring Report, "Literacy is crucial to the acquisition, by every child, youth and adult, of essential life skills....and represents an essential step in basic education, which is an indispensable means for effective participation in the societies and economies of the 21st century."¹⁶

Decisions related to reading instruction are inherently decisions about language. It is impossible to design, implement and expand a successful reading improvement initiative without first understanding and making informed decisions about language issues. For example:

- Which language or languages should be used for reading instruction?
- When and how should children learn to read a specific language or languages?

¹⁶ UNESCO, *Education for All: Literacy for Life*, EFA Global Monitoring Report, 2006.

- What teaching and learning materials need to be developed and how will they be language-specific?
- What knowledge and skills do teachers need to be able to effectively teach reading in specific languages?
- How do we know how well children are learning to read across languages?

These questions are salient globally in the many low- and middle-income countries where USAID is working with partners to improve reading outcomes. For example, while some countries provide instruction in some children's first languages, in many, such as those in sub-Saharan Africa, this is only through early primary. Consequently, many children still do not have access to literacy in the languages they use and understand, including sign language.

While access to reading instruction in the languages—and dialects—children use and understand has improved significantly through USAID-supported reading programs, language mapping studies and analysis supported by USAID reading programs in countries including Afghanistan, Ghana, Madagascar and Mozambique (see **Section 3.1.5, Conduct a language mapping exercise** for more details) have shed light on the need to increase both access to reading instruction and the quality of instruction.

And a systematic review of early literacy in the Latin America and Caribbean (LAC) region, conducted by AIR through the USAID-supported LAC Reads Program, identified a major gap in outcomes and research from the LAC region on language issues and learning to read in indigenous languages.¹⁷



Boys in Cambodia practice reading. Credit: Room to Read

¹⁷ Rebecca Stone, Thomas de Hoop, Andre Coombes, Mariela Goett, Mitchell Morey and Kevin Kamto, What Works to Improve Early Grade Reading in Latin America and the Caribbean: 2016 Update of a Systematic Review. LAC Reads Capacity Program (Washington, D.C.: American Institutes for Research, 2015).

1.2 Benefits of instruction in familiar languages

The benefits of using languages that children speak, use and understand well for instruction have long been established. Research and experience have found numerous advantages to children, teachers, caregivers and communities when education is provided in their first or home language. These advantages are summarized below in **Table 1**, with more in-depth discussion and references to specific research included in **Section 2: Effective reading and language instruction** — *What works?* and in **Annex A: Benefits of instruction in languages children speak, use and understand**.

Table 1. Benefits of instruction in languages children speak, use and understand

Benefit	Evidence (select studies)
1. Improves education access, equity and inclusion. Children who understand the language of instruction upon entry into the classroom are more likely to enter school on time, attend school regularly, and drop out less frequently.	An analysis of data from 26 countries and 160 language groups showed that children who had access to instruction in their L1/mother tongue were significantly more likely to be enrolled and attending school, while a lack of education in the first language was a significant reason for children dropping out. ¹⁸
2. Facilitates efficient reading acquisition. Children who learn to read in a language they use and understand learn more efficiently than if they are expected to learn to read in a language that is not already familiar to them.	Analyses from the 2011 Progress in International Reading Literacy Study (PIRLS), conducted in 49 countries, showed a clear positive relationship between learners' L1 and their reading scores. ¹⁹
3. Supports acquisition of additional languages. Being able to read in a first language supports efficient learning of an additional language.	Research from Kenya found a correlation between grade 3 learners' reading skills in their L1 and English outcomes, with poor English-language outcomes linked to poor L1 skills acquisition. ²⁰ This research aligns with meta-analyses in the US, which have found that learning to read in a home language promotes reading achievement in the second language. ²¹
4. Improves learning outcomes. Being able to read and understand the language used in the classroom in turn facilitates learning across the curriculum.	An analysis of results from the Trends in International Mathematics and Science Study (TIMSS) found that children who reported "always" or "almost always" speaking the language of the test at home performed better in math and science than those who reported they "sometimes" or "never" spoke the language in which they were tested. ²²
5. Promotes learner-centered teaching practices and assessment. When teachers teach in a language that both they and their students use and understand well, they can communicate more effectively, a foundation for effective	Research in Ghana, Niger and Tanzania has found that teachers used more effective teaching practices, used a wider range of teaching strategies, and had more dynamic interactions with

¹⁸ Jeroen Smits, Janine Huisman and Karine Kruijff, *Home Language and Education in the Developing World*. Background paper prepared for the Education for All Global Monitoring Report 2009 (Nijmegen, Netherlands: Radboud University Nijmegen, 2008).

¹⁹ Ina V.S. Mullis, Michael O. Martin, Pierre Foy, and Kathleen T. Drucker, *The PIRLS 2011 International Results in Reading* (Chestnut Hill, MA: Trends in International Mathematics and Science Study (TIMSS) and Progress in International Reading Literacy Study (PIRLS), Boston College, 2012).

²⁰ Benjamin Piper, Leila Schroeder, and Barbara Trudell, "Oral Reading Fluency and Comprehension in Kenya: Reading Acquisition in a Multilingual Environment," *Journal of Research in Reading* 39, no. 2 (2015): 133-152.

²¹ Claude Goldenberg, "Teaching English Language Learners: What the Research Does—and Does Not—Say," *American Educator*, Summer, (2008): 8-44.

²² Michael O. Martin, Ina V.S. Mullis, and Pierre Foy, "Students' Backgrounds and Attitudes Towards Science," TIMSS 2007 International Science Report: Findings from IEA's Trends in International Mathematics and Science Study at the Fourth and Eighth Grades (Chapter 4) (Chestnut Hill, MA: TIMSS & PIRLS International Study Center, Boston College, 2008).

Benefit	Evidence (select studies)
instruction. When students express themselves in a familiar language, teachers can better assess their learning and meet their needs.	pupils when they taught lessons in African languages compared to when they taught in English. ²³
6. Supports parental and community involvement in education. Instruction in a familiar language validates and helps to preserve learners' culture and increases parents' ability to interact with schools, understand what their children are learning, and provide support.	In Ghana, education provided to children in their home languages has resulted in increased awareness among parents and the community of the importance of L1-based instruction in supporting the acquisition of Ghanaian language and English language skills, as well as content knowledge. ²⁴
7. Improves education efficiency. Providing instruction to children is more cost effective and efficient due to reductions in repetition, dropouts, and poor learning outcomes that result when children are not able to learn in a familiar language.	Analysis has shown that instruction in a language children use and understand is more cost effective than instruction in unfamiliar languages due to the reduction in repetition, dropouts, and poor learning outcomes. A study of an L1-based education program in Mali, for example, found that the program cost about 27% less for a six-year primary cycle than for the traditional French-only model. ²⁵
8. Strengthens institutions and reduces likelihood for conflict. Providing children with access to high-quality education provides them with the skills and knowledge they need to gain employment and to positively contribute to their community's and country's overall well-being. This, in turn, helps to reduce social exclusion and poverty, significant drivers of social unrest and conflict.	The existence of strong institutions—including education systems—in areas of high ethnolinguistic diversity has been shown to decrease the likelihood of war and slow economic growth. ²⁶ Lack of instruction in minority languages has led to violence several countries, ²⁷ with limited access to formal school a contributing factor to social and political inequality. ²⁸

These benefits of providing instruction in languages familiar to children have long been recognized in national, regional, and international education fora. In Africa, this includes as far back as the 1961 First Conference of African States on the Development of Education in Addis Ababa, whose delegates recommended L1-based instruction,²⁹ and the recent resource *Optimising Learning, Education and Publishing in Africa: The Language Factor: A Review and Analysis of Theory and Practice in Mother-Tongue and Bilingual Education in sub-Saharan Africa*.³⁰ This long-standing recognition of the importance of familiar languages in supporting children's learning contributed to the 2010 adoption by 18 African Ministers of Education of the *Policy Guide on the Integration of African Languages and Cultures into Education Systems*.

²³ EdQual. "Language of Instruction and Quality of learning in Tanzania and Ghana: The Impact of Language of Instruction, Teacher Training and Textbooks on Quality of Learning in Africa," EdQual Policy Brief No. 2 (Bristol, UK: EdQual Research Programme Consortium, 2010); Mart Hovens, "Bilingual Education in West Africa: Does it Work?" *International Journal of Bilingual Education and Bilingualism*, 5, no. 5 (2002): 249–266.

²⁴ Leslie Casely-Hayford and Adom Baisie Ghartey, *The Leap to Literacy and Life Change in Northern Ghana: An Impact Assessment of School for Life (SfL)* (Accra: School for Life, 2007).

²⁵ World Bank, *In Their Own Language... Education for All*, Education Notes (Washington, D.C.: World Bank, 2005).

²⁶ William Easterly, *Can Institutions Resolve Ethnic Conflict?* (Washington, D.C.: World Bank, 2001).

²⁷ Helen Pinnock, *Language and Education: The Missing Link* (United Kingdom, CfBT Education Trust and Save the Children Alliance, 2009a).

²⁸ UNICEF, *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa*. UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section, 2016.

²⁹ United Nations Economic Commission for Africa and UNESCO, *Conference of African States on the Development of Education in Africa*, Addis Ababa, 15–25 May 1961. Final report (Addis Ababa: UNESCO, 1961).

³⁰ Adama Ouane and Christine Glanz, *Why and How Africa Should Invest in African Languages and Multilingual Education: An Evidence- and Practice-Based Policy Advocacy Brief*. (Hamburg, Germany: UNESCO Institute for Lifelong Learning; and Tunis, Tunisia: Association for the Development of Education in Africa [ADEA], 2010). A UNICEF-commissioned review of language-related policies in Eastern and Southern Africa, however, has found that many countries' approaches do not align with evidence-based best practices. See *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa* (UNICEF, 2016).

1.3 Factors to consider when addressing language issues

Improving how language is used to support children's reading and language and to facilitate learning across the curriculum requires thoughtful, collaborative planning informed by a nuanced and in-depth understanding of the many language-related issues that influence all aspects of reading instruction and learning generally.

These issues can be grouped into four main factors: (1) The sociolinguistic context; (2) the education context; (3) evidence on effective approaches to language and reading instruction; and (4) stakeholder considerations. These issues are important to consider across educational contexts and populations, including public and private sector education systems; formal and informal schooling environments; contexts affected by conflict and crisis; and for learners of various ages and abilities. Each is summarized below, with more detailed information included throughout **Section 2** and **Section 3**.

1. Sociolinguistic context. The sociolinguistic context refers to the various aspects of the environment in which a language is spoken. This includes the languages and **dialects**, or language varieties, spoken in a specific geographic area, by whom, for what purpose and how well (see the Key Term textbox for a complete definition of dialect). It also includes the degree to which a language has been developed, standardized and used. Most countries consist of regions and communities that vary in the number of languages residents speak and the degree to which different languages are used in everyday life. One country, therefore, may have multiple language environments—monolingual, bilingual or multilingual. Mapping the sociolinguistic context—e.g., what languages and dialects are used in the community, in schools and by children—is an important first step in helping to identify what languages will be used for instruction. It will also help to inform instruction, materials and teacher training.

Key term: Dialect

A dialect is a particular form of a language, often spoken in a specific geographic area and/or by a specific ethnic or social group. It can be distinguished from other varieties of a language by its unique vocabulary, grammar and pronunciation. The dialects or varieties of a particular language may be closely related and mutually intelligible or understood by speakers of different dialects. In other cases, different dialects of the same language may not be mutually intelligible. Categorization of a language variety as a dialect or as a unique language is usually not based solely on linguistic factors, but on political, historical or other considerations.

Section 3.1.3 describes specific steps to take to gather information to gain a comprehensive understanding of the sociolinguistic context, including in environments affected by conflict and crisis, and how to apply this information to reading program design, implementing, monitoring and evaluation.

An understanding of language issues in **contexts affected by conflict and crisis** is also important. Those designing and implementing reading programs should not assume that the use of languages children speak and understand well for literacy instruction will exacerbate conflict. Conflict can take place in linguistically homogenous countries (such as Somalia) and in linguistically diverse countries, even when one language is used for instruction (e.g., Portuguese in

Angola³¹). The issue of language and conflict is further explained in **Textbox 2** as well as addressed elsewhere in this Handbook. **Annex C** includes a list of additional resources that can be used to support reading and education programming in conflict and crisis contexts, and **Annex D** shares USAID's experience working to improve literacy outcomes in multiple languages in Afghanistan.

2. Educational context. The educational context includes a country's or region's policies, goals and practices with respect to education and language. This includes official policies with respect to the languages to use for instruction, at what grades and for what purposes. It also includes: the curriculum for language and reading instruction; specific approaches used for teaching reading and language; the amount of instructional time allocated, available and used to teach language and reading; and the quality and appropriateness of teaching and learning materials in different languages.

The education context also includes learner proficiency in different languages (e.g., comprehension and communication abilities) and teacher-related language considerations (e.g., teachers' knowledge and skills related to reading and language instruction; their proficiency in different languages; the alignment between pre-service education and national policy on LOI; and the degree of teacher-to-student language match in classrooms). Data related to these issues is essential to effectively addressing language issues within the context of a reading program. This is true for education taking place in contexts affected by crisis and conflict as well. Steps to guide information gathering and application with respect to the educational context are described in **Section 3**.

3. Effective approaches to language and reading instruction. This refers to the research-based evidence on how children learn language, how they learn to read, and how they learn content most effectively. This includes research regarding the critical skills that children need to learn to read (starting with oral and expressive language skills, in the case of children who are deaf or hard of hearing) and best practices for teaching them. It also includes knowledge of how to most effectively teach reading depending on the specific characteristics of a language. It is critically important for reading program planners and implementers to understand evidence-based best practices

Textbox 3.

Conflict and language of instruction: Unpacking myths and assumptions

Education can contribute to social tensions or conflict when it increases inequity among groups. Inequities in education access, outcomes and opportunities for employment can arise when certain ethnolinguistic groups are denied a quality education due to the language used for instruction.¹ Recognizing this, several countries that have experienced conflict have used language of instruction policy as a means to support the right of different ethnic groups to access education, an important foundation to improve the quality of life of individuals, communities and countries. For example, after independence, Eritrea supported children's right to instruction in their mother tongue in primary school. In Sri Lanka, too, education policy supports bilingual learning for both Sinhalese and Tamil students.² The peaceful use of multiple languages for instruction in Ethiopia for decades, most recently with the support of USAID, is clear evidence that L1-based multilingual education is not a cause of conflict, but indeed can be a means to avoid or mitigate it.³ Providing children who are displaced from their homes with opportunities to learn in familiar languages as well as the languages they may need to be integrated into a new environment is further important to consider when supporting education provision in these contexts.

Sources:

^{1,2} Education Above All, *Conflict-Sensitive Education Policy: A Preliminary Review* (Doha, Qatar: Education Above All, 2012).

³ Kathleen Heugh, Carol Benson, Berhanu Bogale, and Mekonnen Alemu Gebre Yohannes, 2007; Getachew Anteneh and Derib Ado Jekale, 2006; Wendi Ralaingita, 2018.

³¹ UNICEF, 2016, *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa*. UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section.

for teaching children to read in a first, second or other language. **Section 2: *Effective reading and language instruction – What works?*** explores evidence-based good practices for teaching reading and language, how to teach children to read in their L1 or familiar language, and how to help children acquire second and additional language skills. **Section 3: *Planning for language use – Issues to consider and actions to take*** describes how to apply that evidence to developing a language- and context-specific approach to instruction.

4. **Stakeholder considerations.** Language issues are part of the often complex—and changing—sociocultural and political environment of a given country and context. As such, taking stock of stakeholders’ attitudes, beliefs, experiences, preferences and needs related to language is critical. This includes attitudes and beliefs among parents and caregivers, teachers and school administrators, and education authorities and stakeholders (e.g., those involved in teacher preparation) about what languages children and teachers do or do not speak, use and understand well; how children learn to read; how they learn additional languages most effectively; and preferences for which languages children should learn to read and to use. It also includes an understanding of various socio-political issues related to language and education; the constraints and opportunities related to language use in reading programs; and the capacity and professional development needs of different stakeholders to be able to contribute to and sustain efforts to effectively apply language to support reading and learning. These considerations will be addressed in **Section 3.1.1, *Engage and involve diverse stakeholders***, which discusses how to effectively engage and collaborate with stakeholders on language issues when designing and implementing an initiative to improve teaching and learning.



Stop and reflect: Why language is critical to learning

Activity 1: This activity provides an opportunity for individuals and/or program teams to assess the degree to which they have considered the four important contextual factors and related issues described in **Section 1: *Why language is critical to learning***. These self-reflections can help to pinpoint areas for additional information gathering and reflection.

Read the factors to consider when addressing the language issues. Think about your own work or country program and whether and how it has considered these issues. Use the key below to indicate where you are. I/we have:

1. **Really** considered and addressed these issues in reading program design and implementation.
2. **Somewhat** considered and addressed these issues in reading program design and implementation.
3. **Not considered** or addressed these issues into reading program design and implementation.

Category	Have you considered....	Self-assessment	I/we need to learn more about and consider....
Sociolinguistic context	<ul style="list-style-type: none"> What languages and dialects are spoken and used by children in different geographic areas? Which groups currently have access to education in languages they use and understand, and which do not? Do children have access to education in sign language? 	I/we have.... <input type="checkbox"/> Really... <input type="checkbox"/> Somewhat... <input type="checkbox"/> Not at all...considered and addressed these issues in reading program design and implementation.	

Category	Have you considered.....	Self-assessment	I/we need to learn more about and consider....
	<ul style="list-style-type: none"> Has the orthography, or written representation of the languages, been standardized? 		
Education context	<ul style="list-style-type: none"> What are current education outcomes, particularly in terms of reading and mathematics? Do they vary by home language and language used for instruction? What is the language of instruction policy? Is it implemented in practice? Are teachers proficient in the languages used (or to be used) for instruction? How much instructional time is allocated to teach reading and to teach language as a subject? What materials are available in various languages that could potentially be used to support reading and language instruction? How does language factor (or not factor) into education policies, such as teacher school assignment? 	<p>I/we have....</p> <p><input type="checkbox"/> Really...</p> <p><input type="checkbox"/> Somewhat...</p> <p><input type="checkbox"/> Not at all...</p> <p>....considered and addressed these issues in reading program design and implementation.</p>	
Evidence on reading, language and learning	<ul style="list-style-type: none"> Are evidence-based best practices for teaching reading reflected in the curriculum or pilot reading program? Is research on teaching children to read and write a second or additional language being applied in the context? If children are expected to “transition” from using one LOI to another, what is the approach, or strategy for doing so? Does it reflect evidence-based best practices? 	<p>I/we have....</p> <p><input type="checkbox"/> Really...</p> <p><input type="checkbox"/> Somewhat...</p> <p><input type="checkbox"/> Not at all...</p> <p>....considered and addressed these issues in reading program design and implementation.</p>	
Stakeholder considerations	<ul style="list-style-type: none"> What are stakeholders’ knowledge, attitudes and beliefs related to teaching children to read and learn in the languages they use and understand? What opportunities exist to work with stakeholders in the country to improve reading and language instruction? What is the capacity of stakeholder groups to develop curriculum and TLMs for teaching specific languages, and to train teachers? 	<p>I/we have....</p> <p><input type="checkbox"/> Really...</p> <p><input type="checkbox"/> Somewhat...</p> <p><input type="checkbox"/> Not at all...</p> <p>....considered and addressed these issues in reading program design and implementation</p>	

2. Effective reading and language instruction – What works?

Before you begin: Pre-reading reflections

Before you read this section about how children learn language and learn to read, reflect on the following:

- What questions do you have about how to teach reading in a first language? About how to teach reading in learners' second or additional language?
- What challenges have been encountered in your context with respect to using children's first or familiar languages for instruction? What successes have been encountered?

As you read this section, think about the instructional approach, or way in which reading is taught in your context. Does the approach align with the research-based evidence? If you do not know what approach is used, how can you find out?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Existing research and experience tell us much about how to most effectively use spoken and signed languages to teach children to communicate, read and learn. Reading improvement initiatives can use this information to inform decisions regarding:

- What language(s) (including sign language) to use for reading instruction, as well as instruction across the curriculum;
- How to effectively teach critical reading and language skills; and
- Instructional approaches to effectively teach children to learn to read a first language and additional languages.

Key ideas: Effective reading and language instruction

- ✓ When learning to read for the first time, children learn to read best in a first or home language.
- ✓ Children need to learn specific reading skills to be successful readers; these skills are universal across languages, though strategies for teaching them and the amount of time needed to learn them may differ by language.
- ✓ Learning to read well in a first language (L1) or home language helps children to acquire literacy skills in an additional language.
- ✓ Teachers need to use specific strategies to teach children to read, write and speak a second or foreign language.
- ✓ Some language and literacy skills transfer across languages; teachers need to explicitly teach children how to transfer their L1 language and literacy skills to learning a second language.
- ✓ An additive approach to language of instruction is the most effective strategy to support children to acquire literacy skills in both their L1 and additional languages, as well as to learn academic content.
- ✓ Reading programs provide an opportunity for countries to reflect on the effectiveness of the current approach to language use in education and to potentially identify how it could be improved to support better learning outcomes for all.

Understanding the social, political and educational context, as well as evidence on language acquisition, is important to inform decisions related to language and reading program planning and implementation.

Figure 2 summarizes what we know about effective approaches to language instruction, reading instruction, and use of language to support effective teaching and learning.

Figure 2. Research on language, literacy and learning: What we know



2.1 Key requirements for successful language and reading instruction

Key requirements for effective instruction, no matter what language is used, are described below. These requirements are important for governments, donors and their implementing partners to understand and to address when making decisions about language of instruction for reading, as well as across the curriculum.

Key term: Second, additional and foreign language

A **second or additional language (L2, Lx)** is a language a person learns in addition to a first language. A person who is frequently exposed to an L2/Lx—such as a **language of wider communication** spoken in their community—may become highly proficient in the language, or bi- or multilingual. In contrast, a **foreign language** is not widely spoken and used in a person’s immediate environment. Proficiency in an L2, Lx or foreign language can change over time, and its use may vary depending on the context and purpose of communication.

- **Instructional approach and time for learning.** The instructional approach should utilize evidence-based strategies for teaching children to read and to learn additional languages, as described below in this section. Time must be available during the school day to teach reading and language skills in the L1 and in additional languages to the level of proficiency required by the curriculum. Existing evidence suggests that language arts should be taught

daily, for 90–120 minutes.³² Learners will also require time and instruction in an additional language commensurate with the level of proficiency required.

- **Curriculum and materials.** In contexts where children are expected to read and learn academic content in more than one language, the reading or language arts curriculum should be based on standards that promote the development of bilingual and biliterate competencies (reading proficiency standards are discussed in more depth in **Section 3.7.4**, *Develop language-specific standards and benchmarks*). Quality teaching and learning materials must be available to support teachers' implementation of the curriculum. This includes a curriculum, teacher's guides and books for children that are appropriate for teaching learners in their first language, as well as for teaching them to read an additional/foreign language, as discussed in more depth in **Section 3.3**, *Resources for teaching and learning*. When children are expected to learn academic content in an Lx or foreign language, textbooks need to be adapted to their proficiency level.
- **Teacher language proficiency, instructional skills and training.** As noted previously, teachers are more effective when they are proficient in the same languages their students speak, use and understand best. Teachers who teach second or additional languages, or teach academic content in those languages, also need to be highly proficient in those languages. Professional development, school placement and support need to align with the languages teachers are expected to use in the classroom, as well as the approach to reading and language instruction, issues addressed in **Section 3.4**, *Teachers and teaching*. Teachers also need knowledge and skills related to teaching children to read in an L2/Lx. They also need to be able to effectively teach in a second or additional language.

An approach to language use for instruction that takes into consideration the above requirements will be more likely to be successful than one that does not.



Oral or expressive language skills are critical to children's literacy acquisition. Credit: *Indonesia Prioritas (USAID)*, RTI International

³² Florida Center for Reading Research (FCRR) Curriculum Review Team, *Frequently Asked Questions about Reading Instruction* (Tallahassee, FL: FCRR, 2009); Timothy Shanahan, *How Much Time on Comprehension and Phonics* (blog), October 20, 2013.

2.2 What we know about learning a first language

Learning to use and understand a language is a natural process that begins early in life. Parents, caregivers and others help build knowledge of sounds, vocabulary and concepts by engaging with children orally through songs, storytelling and conversation. (For children who are deaf, early acquisition of expressive language skills in sign language is equally important.) Oral (expressive) language skills provide children with a critical foundational for successful reading and writing development by providing them with knowledge about language sounds, structure and meaning. Research has shown that a child's oral language skills upon starting school are strongly predictive of later reading comprehension skills.³³

Although children usually enter school proficient in expressive language skills (this may differ for children who communicate with sign language if they have not been exposed to a sign-language rich environment), they still need to develop *academic language skills*, even in their first language. Academic language skills are different from language skills used for informal personal communication, and children's proficiency in them may differ.³⁴ Developing academic language skills is a process that takes place as children learn new concepts at school, and it is one that is greatly supported if children are learning academic concepts and content—such as math, science and social studies—in a language that is already familiar to them.

2.3 What we know about learning to read in a first language

Teaching initial literacy in a child's first language is critical. Children learn to read and write, and comprehend text, more efficiently when instruction is in the language they use and understand best—usually their first or “home” language. This is because when children learn how to read in a language they already speak, use and understand, they are able to use their knowledge of that language to support emerging reading skills. This includes applying knowledge of thousands of vocabulary words and familiarity with the grammar, syntax (how words are arranged to form sentences) and sounds of the language(s) they already know and use to decode—or “sound out”—words and determine meaning.³⁵ This ability to read and comprehend in turn creates motivation to read.

With good instruction, most children are able to read in their first language by the end of grade 2.³⁶ The number of years children need to become fluent readers in their first language varies depends on several factors. These include the properties of the language being learned, such as:³⁷

³³ Froma P. Roth, Deborah L. Speece, and David H. Cooper, “A Longitudinal Analysis of the Connection between Oral Language and Early Reading,” *The Journal of Educational Research* 95, no. 5 (2002): 259–272.

³⁴ These two different types of language proficiency are known as Basic Interpersonal Communicative Skills (BICS) and Cognitive Academic Language Proficiency (CALP). Learners acquire conversational fluency (e.g., BICS) faster than they become proficient in academic language (e.g., CALP). See Jim Cummins, *Bilingualism and Special Education: Issues in Assessment and Pedagogy* (Clevedon, England: Multilingual Matters, 1984).

³⁵ I. Nation, “How Large a Vocabulary Is Needed For Reading and Listening?” *Canadian Modern Language Review* 63, no.1 (2006): 59–82; Paul Nation and Karen Ming-Tzu Wang, “Graded Readers and Vocabulary,” *Reading in a Foreign Language* 12, no. 2 (1999): 355–380.

³⁶ Phillip H. K. Seymour, Mikko Aro, and Jane M. Erskine, “Foundation Literacy Acquisition in European Orthographies,” *British Journal of Psychology*, 94 (2003): 143–174.

³⁷ Ibid.

- *The number of symbols and sounds in the language.* Languages with a large number of graphemes take longer to learn since children need to learn all of the sound-symbol correspondences in the language.
- *The depth of the orthography.* This refers to the degree of consistency, or one-to-one correspondence, between symbols and sounds. Languages written in a transparent orthography, or one in which a one-to-one correspondence exists between letters and sounds, can be learned more efficiently than languages that are not transparent, or opaque.³⁸ Spanish, for example, is more transparent than English, which is an opaque language with many more sound-symbol correspondences that children need to learn in order to read well.
- *Visual complexity of the symbols or characters in the language.* In languages with symbols that are highly visually complex, such as those in alpha syllabic languages, it may take longer for children to learn to read than those that are not.

Other factors that influence the amount of time needed to learn to read include the amount of time devoted to reading instruction during the school day, the quality of that instruction, the amount of time children spend reading, the quality of reading materials, and the support for reading acquisition children receive outside the home.



A child learns to blend letter sounds together to read words. Credit: Rwanda MCOP (USAID), FHI 360

³⁸ Evidence suggests that exposure to a language with a transparent orthography may aid the development of phonological awareness when reading in a language with a deeper orthography (e.g., English). See Salim Abu-Rabia and Linda S. Siegel, "Reading, Syntactic, Orthographic, and Working Memory Skills of Bilingual Arabic-English Speaking Canadian Children," *Journal of Psycholinguistic Research* 31, no. 6 (2002): 661–78.

Key literacy skills need to be taught in any language. Explicit, systematic instruction of key literacy skills is critical for children to be able to read with meaningful comprehension, and to learn academic content. Regardless of the language being taught, effective reading instruction includes teaching the following key skills: language skills (vocabulary and knowledge about how those words are meaningfully used in phrases and sentences); concepts of print (knowledge of how print and books work), phonological awareness (awareness of the sound structure of a language); alphabetic principle (understanding that letters represent sounds that form words), spelling (ability to accurately use the graphemes of the language to write down words); vocabulary (knowledge of the meaning of words); reading fluency (ability to read connected text smoothly, quickly and with expression); listening comprehension (ability to listen to and understand text read aloud); reading comprehension (ability to read and understand connected text); and writing (ability to express ideas and knowledge in writing).³⁹

The most effective approach to teach individual skills and the amount of time spent teaching them may vary depending on the specific characteristics of the language. For example, phonological awareness (the awareness of sounds in a language) is important for learning to read all languages. However, alphabetic languages require an awareness of individual *sounds* in words, whereas syllabic languages require an awareness of individual *syllables* in words.

Strong L1 literacy skills facilitate L2 literacy acquisition. Literacy in an L1 promotes cognitive development, which is needed to efficiently learn new languages.⁴⁰ Research has found that long-term success in acquiring skills in a second or additional language is strongly associated with oral and written proficiency in a first language⁴¹ and continued use of L1 in the classroom after an L2 has been introduced as the LOI.⁴² Research from Kenya further supports these findings. An analysis of grade 3 learners' reading skills in their L1 (Gikuyu and Dholuo), Kiswahili (an L1 for some, but an additional language to others) and English found a correlation between learners' L1 reading skills and English outcomes, children with high/strong L1 literacy/language skills had high English-language skills whereas children with poor L1 skills acquisition also had poor English-language skills.⁴³ This supports research globally that once learners acquire a foundation in their L1, they can more readily acquire literacy skills in a new language.

³⁹ The skills are summarized in the GRN webinar and resource package Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success. A weblink to materials and recording can be found in the **References** and **Annex C**. Additionally, the resource Landscape Report on Early Grade Literacy, a GRN publication authored by Young-Suk Kim, Helen Boyle, Stephanie Simmons Zuilkowski, and Pooja Nakamura (Washington, D.C., USAID, 2017) provides in-depth information about specific reading skills.

⁴⁰ Ellen Bialystock, *Bilingual in Development: Language, Literacy and Cognition* (Cambridge, UK: Cambridge University Press, 2006); Geva, 2006.

⁴¹ Jessica Ball, *Enhancing Learning of Children from Diverse Language Backgrounds: Mother Tongue-Based Bilingual or Multilingual Education in the Early Years* (Paris, France: UNESCO, 2011); Center for Applied Linguistics (CAL), 2006; Jim Cummins, "Fundamental Psycholinguistic and Sociological Principles Underlying Educational Success for Linguistic Minority Students," *Social Justice through Multilingual Education* (2009): 19–35; Claude Goldenberg, "Teaching English Language Learners: What the Research Does—and Does Not—Say," *American Educator* (2008): 8–44.

⁴² Diane August and Timothy Shanahan, "Executive Summary: Developing Literacy in Second-Language Learners," In Report of the National Literacy Panel on Language-Minority Children and Youth, 2006; Cummins, 2009; Wayne Thomas and Virginia Collier. *School Effectiveness for Language Minority Students* (Washington, D.C.: National Clearinghouse for Bilingual Education, 1997); Wayne Thomas and Virginia Collier. *A National Study of School Effectiveness for Language Minority students' long-term academic achievement* (Berkeley, CA: Center for Research on Education, Diversity, and Excellence [CREDE], 2002).

⁴³ Benjamin Piper, Leila Schroeder and Barbara Trudell. "Oral Reading Fluency and Comprehension in Kenya: Reading Acquisition in a Multilingual Environment," *Journal of Research in Reading* (2015): 133-152.

2.4 What we know about learning to read in an additional language

Teaching children to read in their L2 or Lx requires specific strategies. Learning a second language in a natural setting, such as in the home or community, and learning to read a second language are two very different processes. Teaching children to read in a language they do not already speak or do not speak, use and understand well requires a specific set of instructional approaches. When children are learning to read, write, speak and use a language they do not already know, and one in which they may not be exposed to outside the classroom, they are essentially learning a foreign language. The approach to teaching children to read a language that is not their L1 therefore needs to reflect best practices for teaching a second or foreign language. That approach also needs to explicitly support children to transfer their language and literacy skills from their L1 to the L2, as described in more detail below.



Children in the Democratic Republic of the Congo learn to read in a national language and French. Credit: DRC ACCELERE! (USAID & UKAID), Chemonics International

The number of years needed to learn to read in an additional language depends on many factors. In an academic context, the number of years needed to read, write, speak and/or use it depends on a number of factors, including: Characteristics of the languages being learned; learner proficiency in a first language; the quality of teaching; the content, intensity and quality of instruction; teacher language proficiency; the quality of teacher preparation; and how

well learning is monitored and evaluated.⁴⁴ Therefore, the amount of time children need to become proficient readers in their L2 in one country may not be the same as in another country, since the languages being learned and other contextual factors may differ.⁴⁵ (For references purposes, a review of research on L2 learning in North America concluded that even after five to six years of study, children learning English were not able to acquire the same oral proficiency skills required for academic learning as their peers who spoke English as an L1.)

Oral language instruction in the L2 beginning in the early grades is thus essential for students to acquire the level of proficiency needed to be successful learners in that language.

Children learn to read an L2 more quickly if it is similar to their L1. Learning to read an additional language that is similar to the first language in which a child has learned to read will be easier and more efficient (and is thus likely to take less time) than learning to read a language that is significantly different. Such differences pertain to the language's script, sounds and vocabulary. For example, in Nepal, the Tharu and Nepali languages are more similar in terms of script, sounds and vocabulary than Nepali and English. Such differences and similarities between the languages children are learning to read will affect interlinguistic transfer (discussed below) and how quickly children learn to read an additional language.

The ability of language and literacy skills to transfer from one language to another varies by skills and language—and must be explicitly taught. As children learn one language, they acquire a set of skills and knowledge about language that they can draw upon when learning and using another language. This principle, known as the Common Underlying Proficiency, or CUP, is depicted in the image in **Figure 3**.⁴⁶ For example, children only need to learn once that print represents speech and carries meaning; they then apply this knowledge when learning an additional language. However, this transfer is not automatic for most children and will require explicit instruction. (Unique features between languages, such as text directionality, need to be explicitly taught.)

The cognitive process of applying literacy skills from one language to another is known as **interlinguistic transfer**. The most efficient direction for transfer is from the L1 to an additional language, although transfer can be multi-directional in nature.⁴⁷ Research indicates that several skills learned in one language may transfer to learning an additional language. These include visual awareness, phonemic awareness, and

Key term: Interlinguistic transfer

Interlinguistic transfer is the process of applying literacy skills from one language to another. Transfer is multi-directional, but the most efficient direction is from the L1 to an additional language. Children need to be explicitly taught how to transfer their language and literacy skills.

⁴⁴ Center for Applied Linguistics (CAL). Developing literacy in second-language learners: Report of the National Literacy Panel on Language-Minority Children and Youth. Edited by Diane August & Timothy Shanahan, Mahwah NJ: Lawrence Erlbaum, 2006, 4.

⁴⁵ Esther Geva. "Learning to read in a second language: Research, implications, and recommendations for services." In *Encyclopedia on early childhood development*, edited by R. E. Tremblay, R. G. Barr, and R. DeV. Peters (Montreal, Quebec: Centre of Excellence for Early Childhood Development, 2006).

⁴⁶ Jim Cummins, "Interdependence of First- and Second-Language Proficiency in Bilingual Children," in *Language Processing in Bilingual Children*, edited by Ellen Bialystock, 70-89 (Cambridge, UK: Cambridge University Press, 1991); Jim Cummins, Birgit Harley, Merrill Swain, and Patrick Allen. "Social and Individual Factors in the Development of Bilingual Proficiency," in *The Development of Second Language Proficiency* (Cambridge, UK: Cambridge University Press, 119-330, 1990).

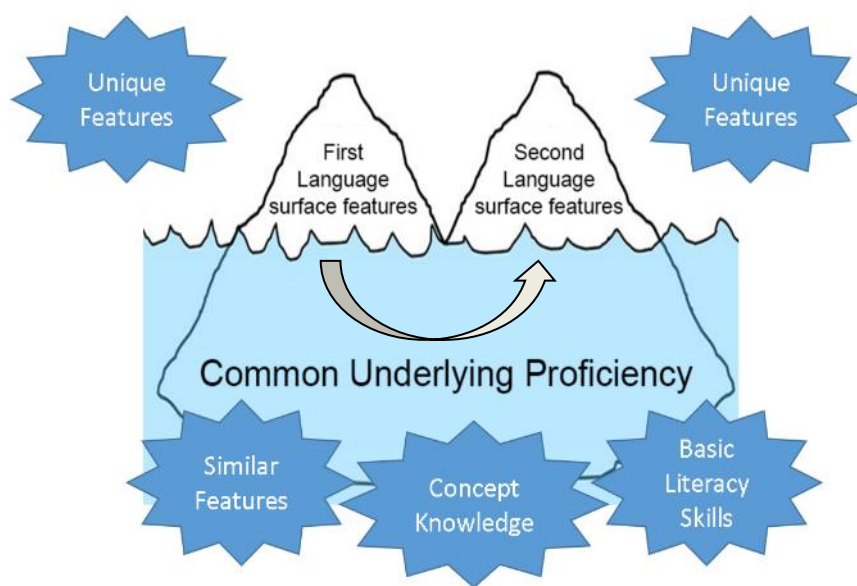
⁴⁷ Ellen Bialystok, "Metalinguistic Dimensions of Bilingual Language Proficiency," in *Language Processing in Bilingual Children* (Cambridge: Cambridge University Press, 1990); Ellen Bialystok, "Reshaping the Mind: The Benefits of Bilingualism," *Canadian Journal of Experimental Psychology/Revue Canadienne De Psychologie Expérimentale* 65, no.4 (2011): 229-35.

automaticity,⁴⁸ though the ability of specific skills to transfer across languages is dependent upon the characteristics of the L1 and L2. With good instruction, children who have developed beginning reading skills (phonemic awareness, fluency and comprehension strategies) will also be able to transfer these skills to learning to read in another language.⁴⁹

Phonological awareness skills also transfer between languages, though differences in word structure across languages may require different approaches to teaching children to decode.⁵⁰ Concept knowledge also transfers across languages. For example, if students learn about the life cycle of a butterfly in their L1, they can apply that knowledge when learning vocabulary and concepts in another language.

Importantly, *teachers should not assume transfer applies to all reading skills*, or that it can happen automatically. Rather, teachers need to explicitly teach children what skills transfer and need to support them in this process.⁵¹ To do so, teachers need to be supported by a curriculum and materials that indicate what, when and how to teach interlinguistic transfer.

Figure 3. Common Underlying Proficiency (CUP) for language acquisition⁵²



⁴⁸ Bialystok, 2006; Geva, 2006.

⁴⁹ Aydin Yücesan Durgunoğlu, William E. Nagy, and Barbara J. Hancin-Bhatt, "Cross language transfer of phonological awareness," *Journal of Educational Psychology* 85 (1993): 453-465; Ellen Bialystok, Gigi Luk, and Ernest Kwan, "Bilingualism, Biliteracy, and Learning to Read: Interactions Among Languages and Writing Systems," *Scientific Studies of Reading* 9, no. 1 (2005): 43-61; Esther Geva and Zohreh Yaghoub, "Efficiency in Native English Speaking and English-as-a-Second-Language Children: The Role of Oral Proficiency and Underlying Cognitive-Linguistic Processes," *Scientific Studies of Reading* 10, no. 1 (2006): 31-57; Ayxa Calero-Breckheimer, and Ernest Timothy Goetz, "Reading Strategies of Biliterate Children for English and Spanish Texts," *Reading Psychology* 14, no. 3 (1993):177-204.

⁵⁰ Cheryl A. Cisero and James M. Royer, "The Development and Cross-Language Transfer of Phonological Awareness," *Contemporary Educational Psychology* 20, no. 3 (2005): 275–303; Aydin Yücesan Durgunoğlu, William E. Nagy, and Barbara J. Hancin-Bhatt, 1993; Jill Leafstedt and Michael M. Gerber, "Crossover of Phonological Processing Skills: A Study of Spanish-Speaking Students in Two Instructional Settings," *Remedial and Special Education* 26, no. 4 (August 2005): 226-235; Johannes C. Ziegler and Usha Goswami, "Reading Acquisition, Developmental Dyslexia, and Skilled Reading Across Languages: A Psycholinguistic Grain Size Theory," *Psychological Bulletin* 131, no. 1 (February 2005): 3-29.

⁵¹ Claude Goldenberg, 2008.

⁵² Florida State University and Creative Associates, Intl. (2018). Introduction to Teaching Early Grade Reading in P1-P3 (Student Teacher Resource Book). Abuja, Nigeria: National Commission for Colleges of Education.

2.5 What we know about effective approaches to language of instruction

Not surprisingly, efforts to improve early grade reading instruction frequently become enmeshed in larger discussions about language of instruction across the curriculum. Given the link between language, literacy and learning outcomes, efforts to improve reading instruction provide an opportunity to discuss with education stakeholders whether the current approach to language use in education is evidence-based and whether it is effective in supporting children's literacy acquisition and learning of academic content. To inform this dialogue, this section presents research and recommendations on **language of instruction** issues that primary grade reading programs typically encounter.

Key term: Language of instruction

Language of instruction, or LOI, refers to the language used for teaching the curriculum in an educational setting. This term is often used interchangeably with medium of instruction (MOI).

While an understanding of the approach to instruction, or way in which curricular content is taught, is more important than identifying a “specific” language of instruction “model,” terms commonly used to describe different approaches to language use for instruction are summarized in **Figure 4**.

Language of instruction policy and practice should be rooted in evidence and tailored to context. Research has long found that the use of children's first/home languages is the most effective approach to teaching children to read and to learn. In contexts where children's L1 is not used for reading instruction, those supporting reading improvement can share research about the benefits of an L1-based approach to reading instruction. In places where many languages are used, a contextual analysis that includes language mapping (discussed in detail in **Section 3.1**) is highly recommended. Pilot studies and rigorous monitoring and evaluating can further inform a discussion about what languages should be used for instruction.

Using the same language(s) of instruction for teaching reading and subject content supports *both* literacy and learning. While time during the school day needs to be dedicated to explicitly teaching children reading and writing skills—preferably 90-120 minutes⁵³—children need opportunities to practice the skills they are learning. This process is supported when children learn subject content *in the same language they are learning to read*. For example, alignment of the language used for reading instruction and for curricular teaching subject content provides children with an opportunity to build vocabulary and background knowledge, two important literacy skills. (Children can also benefit from reading informational text provided during their reading/language arts class.) Finally, providing children with an opportunity to learn academic content in their L1 can also help build support for reading instruction in children's home languages, as teachers, parents and other education stakeholders may see its value in facilitating children's learning across the curriculum.

Children need sufficient time, quality instruction and materials in an additional language to effectively learn in it. As mentioned earlier, the amount of time learners need to gain sufficient proficiency in an Lx to learn it will vary

⁵³ Florida Center for Reading Research (FCRR) Curriculum Review Team, 2009; and Timothy Shanahan, 2013, October 20.

depending on the specific learner, context, characteristics of the languages being learned, and other factors.⁵⁴ While students can acquire L2 literacy skills in a few years, their ability to comprehend lags due to their limited language proficiency. This in turn makes it difficult to learn academic content in the language. Using a second language as the LOI when children have not yet acquired the language and literacy skills they need to learn in it will therefore not be successful.

An early exit approach to language of instruction may not result in children learning to read well in either their first or an additional language. Decades of research and experience in both low- and high-income contexts have found that an approach to language of instruction in which learners transition away from learning in their L1 to learning solely in a second or additional language—usually one that is a foreign language—is ineffective in supporting children’s literacy development, second language acquisition and academic learning. The result of this approach, known as the early exit transitional model, has been poor reading outcomes in children’s L1, in their L2/Lx language ability, and across subjects, as evidenced by various national and international reading, math and sciences assessments.⁵⁵ In Northern Nigeria, for example, an early grade reading assessment conducted in both Hausa and English with the same children found that students in grade 3 did not have the English skills required to successfully learn in English starting in grade 4, at which point instruction is only provided in that language.⁵⁶ Similarly, recent evidence from the Philippines has also found children are not acquiring the proficiency they need in an L2 to transition to learning in it starting in grade 4.⁵⁷

An approach to language of instruction that supports children’s literacy and learning in *both* their L1 and an additional language is recommended. Research has found that an additive approach to instruction—one in which children’s L1 and an additional language are used to support literacy and learning—is more effective than an approach in which children’s L1 is *subtracted*, or its use discontinued as a language of formal instruction.⁵⁸ Key to the additive approach is its support for *continued acquisition of L1 skills while at the same time facilitating learning of an L2/Lx*. This model, which is common in multilingual environments in Europe, also facilitates children’s *learning of academic content* by providing them with an opportunity to learn it in their L1 while they continue to build proficiency in their L2 or additional language.

The longer children are able to learn in a familiar language, the better their learning outcomes. In contexts where education systems require children to transition from one language of instruction to another, research has found a late transition (e.g., after 6-8 years of instruction) to be more beneficial to students’ learning outcomes than an early exit model (e.g., after 3-4 years of instruction). Evidence from Ethiopia, for example, found that the late exit approach to language of instruction was more effective in producing higher levels of learning outcomes than early exit models, with children who received instruction in L1 through grade 8 having higher learning outcomes than children who exited L1 instruction earlier.⁵⁹

⁵⁴ Claude Goldenberg, 2008.

⁵⁵ These assessments include national exams as well as assessments including reading. See **Section 1** for a summary.

⁵⁶ RTI International. *Nigeria Reading and Access Research Activity (RARA): Results of an Approach to Improve Early Grade Reading in Hausa in Bauchi and Sokoto States*, 2016a.

⁵⁷ Education Development Center, Inc. (EDC). *Mother Tongue-Based Multilingual Education in the Philippines: A Study of Literacy Trajectories*, 2017.

⁵⁸ Names for different language of instruction models may vary by context. It’s also important to note that their application may look different in different contexts. For example, in the United States, the L2 in an additive bilingual program is usually English, which is a widely spoken language of wider communication (LWC) in the U.S. However, in sub-Saharan African countries, the L2 or Lx is usually *not* a widely spoken LWC in the children’s environment.

⁵⁹ Heugh, Benson, Bogale, and Yohannes, 2007.

While research and experience in many countries has found the additive or late exit approach to language of instruction to be the most effective in supporting language, literacy and learning, it has been slow to take hold in many low-income contexts, for a variety of reasons. These include the perceived high cost of a bi- or multilingual approach to LOI; lack of understanding about how children learn to read and how they learn subject matter most effectively; assumption that learning in L1 impedes rather than supports L2 acquisition; negative attitudes towards certain languages and those who speak and use them; lack of leadership and motivation to change the status quo; and in some cases social or political preferences unrelated to learning goals. These myths and assumptions are summarized in **Annex B, *Myths and assumptions about L1-based multilingual education*** and addressed throughout **Section 3**.

Supporting a successful transition from learning in L1 to learning in L2 requires careful planning. Research and experience provide guidance on how to support children's transition from learning in their first language to learning in their L2, or Lx, if such a transition is identified as necessary. Evidence-based best practices include:

- **Develop a curriculum in which L1 and L2 literacy instruction is aligned.** The scope and sequence, or content and order, in which L1 literacy and L2 language and literacy skills are taught, need to be related. Such alignment supports linguistic transfer.
- **Focus on building L1 language and literacy skills.** In the early grades, teachers should focus on helping children gain a strong foundation in the L1. Strong language and literacy skills in L1 will help children learn curricular content and build a foundation for learning an additional language.
- **Develop children's oral language skills in the L2.** In contexts where children are expected to learn in the L2, building children's oral language skills early is important. Strong oral language instruction will help children learn vocabulary and concepts that will in turn support their ability to learn to read in the additional language, as well as to learn academic content in it.
- **Explicitly teach the L2 and how to transfer skills from L1 to L2.** Time needs to be allocated during the school day to explicitly teach the second or additional language. Instructional strategies specific to teaching second language learners should be used. Teachers also need to explicitly teach children how to transfer literacy skills from one language to another.
- **Build a bridge from learning content in L1 to learning it in an L2.** When children learn new content, start by teaching it in their L1 to build knowledge of concepts and vocabulary. Then teach it in the L2. Informational texts can be helpful in supporting children's acquisition of content knowledge in both the L1 and L2.
- **Transition gradually from one LOI to another.** Transition of instruction to an L2 or foreign language must be gradual and well planned. The timing should be based on evidence regarding learners' language competencies, not grade level. Requiring children to transition too abruptly or too soon can result in their failure to learn to read a first language, acquire a second language, and learn academic content.
- **Continue to use the L1 to support L2 acquisition and content mastery.** Continuing to build children's reading and writing skills in their L1 supports their ongoing L2 development and maximizes the benefits of inter-linguistic transfer.⁶⁰ Importantly, continued use of children's L1 as a language of instruction—and assessment—across the curriculum also supports their ability to continue learning subject content, without language being a barrier.

⁶⁰ Cummins, 2009, 2012.

- **Evaluate the effectiveness of the instructional approach.** Importantly, once implemented, the specific approach to using language for instruction needs to be rigorously evaluated to assess whether children are obtaining the required reading and writing skills in their first and additional languages to be successful learners across the curriculum.

Figure 4. Common approaches to language of instruction⁶¹

Approach	Characteristic
Additive	The goal of the additive approach is for children to achieve high levels of proficiency in both their first language and additional languages. Children receive instruction in their L1 or familiar language while an L2 is introduced gradually, first as a subject with the focus on oral language acquisition. Both languages are used for instruction, with the addition of a second language complemented by continued use of a first language. The additive approach—also sometimes referred to as dual language or maintenance bilingual—is used in most European countries to facilitate learning of additional languages.
Transitional	In this approach, learners' first language is used for a few years in primary school, but its use is eventually "phased out." Sometimes referred to as subtractive bilingualism, the goal of this approach is that a second language—often a foreign language to most students—be used for instruction, with use of children's first languages phased out within a few years. (If phased out within two to three years, the approach is referred to as early exit ; if phased out at the end of primary, the approach is called late exit). This approach—particularly the early exit model—is common throughout Africa as well as Asia and Latin America.
Subtractive	The goal of this approach is for students to learn and to learn in an official language, frequently students' L2 or foreign language, as quickly as possible. Children's L1 is hardly used for instruction. The subtractive approach is sometimes referred to as a "submersion" approach because children's learning is not supported through the use of their L1 or home languages.

⁶¹ Content adapted from: Agatha J. van Ginkel, *Additive Language Learning for Multilingual Settings* (Washington, DC: JBS International, 2014).



Stop and reflect: Effective reading and language instruction

Activity 2: This activity provides an opportunity for individuals and/or program teams to assess what they have learned in **Section 2** and to identify specifically how the information can be applied to their work.

1. What are two new pieces of information you learned in Section 2 about how children learn to read and how they acquire additional languages? How could you apply what you learned to your work?

1. _____
2. _____

2. Read the list of evidence-based approaches to reading instruction in the table below. Reflecting on your program or context, indicate if each one is being applied or not. If not, why? How might you/the program develop and apply this approach to support improved reading and learning outcomes?

Evidence-based approach	Is this evidence-based approach being applied in your context?		If no, how might this evidence-based approach be developed and applied?
Children learn to read most efficiently in their first or home language.	<input type="checkbox"/> yes	<input type="checkbox"/> no	
Children should be introduced to learning a second language gradually, starting with instruction in oral language.	<input type="checkbox"/> yes	<input type="checkbox"/> no	
When teaching children to read in two languages, curriculum should be aligned to support efficient and effective language and literacy skills transfer.	<input type="checkbox"/> yes	<input type="checkbox"/> no	
Children should be explicitly taught how to transfer their language and literacy knowledge and skills from one language to another.	<input type="checkbox"/> yes	<input type="checkbox"/> no	
Children should continue to learn how to read in their L1 after an additional language is introduced.	<input type="checkbox"/> yes	<input type="checkbox"/> no	
Children should be able to learn academic content in their L1, even after an L2 is introduced.	<input type="checkbox"/> yes	<input type="checkbox"/> no	

3. Planning for language use – Issues to consider and actions to take

This section applies the evidence and issues discussed in **Section 2: *Effective reading and language instruction—What works?*** into a set of recommendations and specific actions that USAID and its implementing partners, including government, can collaboratively undertake to systematically, holistically and successfully account for and integrate language issues in their reading programming.

The recommendations are organized topically into the subsections listed below, each of which includes a list of specific activities and considerations designed to support reading programs to develop, operationalize, monitor and evaluate an approach to reading instruction that carefully and comprehensively takes language issues into account.

- 3.1 Foundational Planning
- 3.2 Instruction and Assessment
- 3.3 Resources for Teaching and Learning
- 3.4 Teachers and Teaching
- 3.5 Communication, Advocacy and Support
- 3.6 Monitoring, Evaluation, Research and Learning
- 3.7 Policies, Standards and Plans

It's important to emphasize that the recommendations and activities described in this section are not intended to be *in addition to* those that EGR programs already may be doing, such as developing teaching and learning materials and delivering teacher professional development. Rather, the recommendations are designed to help programs develop an approach to reading instruction—or improve upon what they are already doing—that takes language into consideration in an appropriate and effective way. Some activities are sequential, while others will take place concurrently. At times, programs may need to go back to a particular step once they have monitored or evaluated an approach.

Table 2 summarizes expected outcomes from activities outlined in this resource. These outcomes set the stage for conditions to be in place to support a successful approach to language use for instruction.

Reading programs' experiences conducting the activities described in this section are woven throughout to illustrate how the recommendations have been applied in the "real world." References to resources and tools that can be consulted for additional information and support are described in the text and summarized in **Annex C, *Resources for planning for language use in education***.

Table 2. Checklist of conditions for successful reading instruction and learning

Topic	Checklist of conditions for success
3.1 Foundational Planning	<ul style="list-style-type: none"> ✓ Country-specific information about the sociolinguistic and educational context analyzed; situational analysis conducted to make informed decisions ✓ Diverse stakeholders engaged and “champions” identified to shepherd the language planning and implementation process over the long term ✓ Process for decision-making and planning developed, communicated, and agreed upon ✓ Accurate data gathered regarding languages spoken and used, and levels of proficiency among teachers and learners in relevant geographic areas and schools ✓ Orthographies standardized for languages to be used for instruction ✓ Languages to be used for instruction identified based on appropriate considerations and through a consultative process ✓ Learning opportunities identified/provided to support stakeholders’ ability to identify and address language-related issues in reading programming and the education sector more broadly
3.2 Instruction and Assessment	<ul style="list-style-type: none"> ✓ Languages analyzed to inform appropriate approach to reading instruction, as well as for teaching languages as L2 or Lx ✓ Curriculum developed that reflects evidence-based best practices for teaching reading and language, as well as teaching curricular content in specific languages, as appropriate ✓ Sufficient instructional time available for teaching reading, for learning language, and for learning curricular content ✓ Competency-based language standards and benchmarks identified ✓ Appropriate language-specific assessments developed and aligned at all levels (e.g., formative classroom-based assessment, national exams and international assessments)
3.3 Resources for Teaching and Learning	<ul style="list-style-type: none"> ✓ High-quality, contextually appropriate teaching and learning materials developed for the relevant languages and grades ✓ Tools and processes developed to support future production of high-quality materials ✓ Country stakeholders have the capacity to develop teaching and learning materials ✓ Reading materials openly licensed and available electronically to facilitate greater access
3.4 Teachers and Teaching	<ul style="list-style-type: none"> ✓ Teachers proficient in the languages used to for instruction ✓ Teachers have the knowledge and skills needed to implement an appropriate instructional approach to teaching reading, language as a subject, and curricular content ✓ Pre-service teacher training curriculum, approach, language of instruction and materials aligned with curriculum ✓ Teacher educators aware of and “on board” with new language plan, proficient in the languages of instruction, and knowledgeable about the instructional approaches that teachers will be trained to use ✓ Teachers have the required resources for teaching in the target languages ✓ Teacher recruitment and placement policies and processes allow for effective implementation of the curriculum and plan for language use in education, while at the same time do not unduly restrict teachers’ mobility and professional development

Topic	Checklist of conditions for success
3.5 Communication, Advocacy and Support	<ul style="list-style-type: none"> ✓ Advocacy conducted with all stakeholders, using appropriate methods and media, to garner their input and support on language-related issues ✓ Stakeholders engaged in supporting children's reading and language acquisition at home and in the community
3.6 Monitoring, Evaluation, Research and Learning	<ul style="list-style-type: none"> ✓ Language integrated into MERL plan for reading programming or education sector achievement more broadly ✓ Fidelity of implementation regularly monitored ✓ Reading and language outcomes disaggregated by language and other important demographics, and reported appropriately ✓ Specific approach to monitoring, evaluating and conducting research on language-related aspects of reading program established ✓ Research conducted to fill context- and language-specific knowledge gaps, using USAID's Learning Agenda as a guide
3.7 Policies, Standards and Plans	<ul style="list-style-type: none"> ✓ Education sector policies include specific references to language and are based on evidence on effective use of language to support reading and learning ✓ Reading standards and benchmarks for specific languages developed and approved, using the Global Proficiency Framework as a guide ✓ Plan developed and implemented to support improvement in reading and foundational skills

3.1 Foundational Planning

Before you begin: Pre-reading reflections

Before you read this section on Foundational Planning, reflect on the following:

- Which stakeholders have been involved in discussions, decisions and activities related to language use in reading programs? What challenges and successes have you encountered?
- What information about language has been gathered to inform the reading program? What additional information do you think is needed?
- What questions do you have about how reading programs can integrate language-specific issues into their planning?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

USAID reading programs frequently report that taking time to gather information and conduct background research on language-related issues pays dividends later in the form of the program's ability to develop and implement a quality, effective approach to reading improvement. The inverse is also true—programs that did not engage in language-specific planning are now doing so years after implementation has begun in order to address gaps in achievement, inequities in outcomes, and other issues.

USAID and its implementing partners are thus highly encouraged to invest time and resources into the **Foundational Planning** steps and activities outlined below. It is recommended that at least the first year of a primary grade reading and literacy program be dedicated to these activities, which include engaging and involving stakeholders and conducting a situational analysis to inform the design of the approach to language and reading improvement. Even if a program is already underway, the steps below can still be adapted and carried out to improve upon current efforts.

3.1.1 Engage and involve diverse stakeholders

The multi-faceted nature of language issues requires reading programs to engage and involve diverse stakeholders throughout the planning and implementation process. This includes providing the appropriate opportunities for stakeholders to share their knowledge and perspectives, to learn about and discuss issues, and to ground decisions in evidence. (Stakeholders will likely also bring a set of concerns that need to be addressed through advocacy, social mobilization efforts and opportunities for learning and professional development.) This involvement will help to build a shared sense of purpose and understanding that will help support the implementation and uptake of new plans, policies and approaches.

Key ideas: Foundational planning

- ✓ Diverse stakeholders need to be engaged in all aspects of language-related information gathering, decision making, planning, implementation, monitoring and evaluation to contribute their knowledge, experiences and resources, and to build consensus on an effective approach to reading and language use.
- ✓ A situational analysis to gather language-specific information undertaken early on in the reading program design process is a valuable investment of time and resources; findings will inform activities and approaches across reading components and will increase the likelihood of successful outcomes.
- ✓ As part of a situational analysis, conduct a language mapping exercise to gather current and reliable information about languages and dialects used, and the language proficiency of children and teachers.
- ✓ Language analysis (including analysis of dialects) is an important step to conduct prior to selecting languages and designing an instructional approach.
- ✓ Language-specific activities should be incorporated into a reading program's work plan, budget and approach to MERL.

Reading program stakeholders may include, but are not limited to, those listed in **Table 3. Stakeholders to engage and involve in language-related planning.** Each of

these stakeholder groups will be able to contribute knowledge, resources and experiences that can be harnessed to develop a plan for improving reading outcomes that is rooted in evidence regarding how children learn to read and learn language most effectively, while at the same time being feasible and appropriate for the context.



Community members in Northern Nigeria discuss education access and quality issues.
Credit: Nigeria RARA (USAID), RTI International

Table 3. Stakeholders to engage and involve in language-related planning

Group	Description
Government education representatives	Government personnel from the relevant institutions and departments responsible for developing, implementing, and managing different aspects of reading programming will be needed (e.g., curriculum development, materials development, monitoring and evaluation, etc.). Other relevant government stakeholders include those responsible for providing educational opportunities to children with hearing or visual impairments; those responsible for providing education to conflict- and crisis-affected children and youth; and those responsible for nonformal education or cultural, minority, or religious affairs (which may already be implementing literacy programs in children's familiar languages and may thus have experiences and resources to share).
Teachers and teacher unions and associations	Teachers are the ultimate implementers of language and reading curricula and policies. Moreover, they are the ones who understand the day-to-day implications of language issues on student learning. Therefore, their meaningful involvement in planning for language use in a reading program—and across the curriculum more broadly—is critical. Teachers and teacher unions should be directly involved in activities including assessment of teacher knowledge, skills and practices related to language; the development of language-specific materials; and the development of language-specific teacher professional development, among other areas.
Teacher professional development institutions	Teacher training institutions need to be fully engaged in the design and development of policies, plans and materials related to language and reading instruction. Their support will be required for implementation of an effective approach to teacher pre- and in-service professional development.
Reading and language specialists	Their expertise is critical to identifying the most appropriate instructional approach for teaching reading in specific languages; developing teaching and learning materials for target languages; and conducting language mapping surveys and other assessments. Language specialists/linguists will be needed to support orthography review and standardization. Their knowledge of the specific properties of a language can be used to inform the approach to reading instruction, and the scope and sequence, the development of which should be led by a reading specialist. These specialists will need to work closely together to develop the most effective, appropriate approach.
Language associations, linguistics institutions, and cultural associations	These groups may already be providing or supporting literacy and language learning in languages children use and understand. They may be able to contribute teaching and learning materials in those languages, and their experiences may offer useful lessons on best practices for instruction in familiar languages. Groups organized to support culture also can be involved in developing and/or reviewing teaching and learning materials (such as stories) to make sure they are culturally and linguistically appropriate. Finally, these organizations may be useful partners in conducting social advocacy around L1-based reading and language instruction.
Organizations supporting children with disabilities, conflict-affected children and others with specific needs.	Groups with experience providing education to children who are deaf, hard of hearing or deafblind and to children who are blind or visually impaired are essential to developing an appropriate and evidence-based approach, developing materials and training teachers to meet these learners' specific needs. These groups can help reading programs to develop an appropriate approach for using sign language and Braille. Other groups that should be called upon at all stages of the planning and implementation process include groups that work with refugee or conflict-affected populations, and others with specific needs, such as nomadic populations or minority language groups.
Publishing groups (public, private and government sector)	The development, printing, distribution and ongoing replenishment of high-quality, language-specific teaching and learning materials is critical to the success of reading improvement initiatives. All relevant stakeholder groups, both within and outside of government, should be brought to the table to help identify what teaching and learning materials exist, to learn technical specifications for TLMs, to become knowledgeable about issues related to open licensing, and to improve issues related to the book supply chain.
Parents, caregivers and community members	Both literate and non-literate members of a community can contribute in many ways to the development and implementation of an effective plan for L1-based reading instruction and language learning. This includes participating in language mapping activities, developing materials, and supporting teachers by providing after-school support to learners. Caregivers' and communities' understanding of language issues and the value of providing initial reading instruction in familiar languages is key to successful implementation, as it will determine, in part, whether children attend school regularly and whether they receive the necessary support at home to support their successful acquisition of language and reading skills.

Once identified, involve relevant stakeholders in appropriate and meaningful ways of contributing to the development and implementation of specific aspects of the reading program. For example, government personnel, teachers and parents can work with technical experts such as linguists and reading specialists to conduct various aspects of a language mapping (see **Section 3.1.5: Conduct a language mapping exercise**). Their involvement will help to surface existing attitudes and beliefs, identify challenges and potential solutions, provide opportunities to learn about language issues, and help to bring people on board with proposed approaches. It can also decrease the politicization of language issues if people are engaged in collaborative planning and have an opportunity to understand the twin issues of evidence and context around which decisions need to be based.

Example from practice 1 highlights three USAID-supported reading programs' collaboration with government on language issues.

Example from practice 1:

Collaborating with government on language issues: Reflections from three reading programs

To celebrate International Mother Language Day (IMLD) in 2018, three USAID-supported reading programs shared their experiences working closely with government on language issues. Learn more about the experiences of Ethiopia, Nepal and the Philippines from the webinar “Language Policy, Planning and Practice in reading Programs.”

Source: Susan Bruckner, Wendi Ralaingita, and Jhum Rai. *Language Policy, Planning and Practice in Reading Programs*, March 6, 2018, webinar.

3.1.2 Provide stakeholders with learning opportunities to build capacity and leadership

Stakeholders will likely need support to both harness their knowledge and experiences, as well as to build their capacity to support language-related planning and sustainable engagement during and after the life of a project. Therefore, EGR improvement efforts should allocate time and resources to provide stakeholders with learning and professional development opportunities. Different stakeholders—from senior MOE officials to parents to teachers—will have different needs when it comes to understanding and learning about language issues. For example, parents may need information about the advantages of children learning to read in their home language and reassurance that such instruction will help facilitate their acquisition of additional languages. A clear plan for providing them with this information—e.g., through school-based meetings, radio programming or other accessible media—needs to be developed.

Government officials may need similar information, along with professional development opportunities to build their knowledge and skills in particular areas, such as curriculum design, materials development, and teacher professional development related to language issues. Stakeholders' involvement in activities such as language mapping and the development of teaching and learning materials should be structured in such a way that they provide genuine opportunities for knowledge and skill building. This will mean not rushing activities but taking the time to build in opportunities for learning. Such efforts are critical to building the foundation for sustainability and country self-reliance beyond the life of a donor-funded project.

Leadership in government education institutions is crucial to the success and sustainability of reading improvement efforts.⁶² It is therefore essential to identify and work with senior-level leaders and “champions” who can continue to advance and improve efforts to plan for effective language use in reading programming, and effective approaches to language of instruction generally. Ideally, “champions” should be people who are likely to remain in their positions for

⁶² Joe DeStefano and F. Henry Healey, *Scale-up of Early Grade Reading Programs* (Research Triangle Park, NC: RTI International, 2016).

several years to shepherd the process over the long-term. However, senior-level appointments can and should be engaged as well since their leadership can be an important foundation for reform. It's important to note that while reading and language “champions” may already exist within the system, the process of engaging with stakeholders and providing them with opportunities to learn and to



A teacher supports a child learning to read and write (see Example from practice 2). Credit: Nepal Early Grade Reading Program (USAID), RTI International

enhance their knowledge and skills will also help to cultivate leaders who can carry forth ideas and actions.

Example from practice 2 describes how engagement with government stakeholders in Nepal eventually led to positive outcomes with respect to addressing language issues.

3.1.3 Conduct a situational analysis and gather information focused on language

Conducting a situational analysis focused on language is essential to inform the design and implementation of a reading program. The process is also useful even if a reading program is already underway to fill in information gaps, to help assess and understand outcomes to date, and to inform efforts to expand and sustain a program beyond the life of the project.

As discussed in **Section 1.3**, *Factors to consider when addressing language issues*, understanding the sociolinguistic context and the educational context is essential to making informed choices regarding language use in reading

Example from practice 2:

Understanding and addressing political realities in Nepal to inform reading program design

In Nepal, planning for mother tongue-based reading instruction initially faced several challenges. When the USAID-supported Early Grade Reading Program (EGRP) (2015-2020), which was designed to support the government’s National Early Grade Reading Program (NEGRP), began, the country was in the midst of ratifying a new constitution and shifting to a federal system. During this transition period, political sensitivities, as well as competition for priorities and a lack of clarity about the new system, made it difficult to undertake new, mother tongue instruction initiatives. In addition, some key stakeholders were skeptical of mother tongue-based instruction, while parents generally preferred English instruction. However, opportunities to introduce language-related reforms also existed: Ministry policy and planning documents were supportive of mother tongue education, and some small-scale mother tongue activities had already taken place.

It was against this backdrop that Nepal’s Language Commission began to engage in an intensive effort to understand and address the various political realities and stakeholder concerns. Recognizing that language issues are not “just” about pedagogy, the Commission began gathering information and investigating issues related to policy, political economy, and language status. EGRP also worked with the government to undertake research on attitudes about language issues and realities “on the ground,” integrated language information into the education management information system, and initiated school language mapping from this data. EGRP is now supporting the government of Nepal to use the information from these studies in order to initiate discussions at the local level and support local governments to consider options for language in education policy and planning. In addition, the country’s Curriculum and Development Center has now developed instructional materials for reading in three mother-tongue languages.

Sources:

Wendi Ralaingita, “Language Policy, Planning and Practice in EGR Programs in Ethiopia & Nepal” (webinar) 7, March 2018; Jhum Rai, Language Policy, Planning and Practice in Nepal (webinar), 7, March 2018; Amanda Seel, Yogendra P. Yadava, and Sadanand Patel, *Medium of Instruction and Languages for Education (MILE): Ways Forward for Education Policy, Planning and Practice in Nepal*, Kathmandu (USAID, Australian Aid, Transcend Nepal, and DoE, MoE, Nepal, 2015)

programs, and throughout the education sector. The information gathered will shed light on how language is affecting access to school and learning outcomes; will help to understand stakeholder interests and needs in different areas; and will identify where changes and improvements are needed—i.e., the curriculum, reading materials, teacher professional development or other teacher workforce issues, or other education sector policies and plans.

Conducted in a transparent and inclusive manner, a situational analysis will also help to generate stakeholder awareness of the importance of language in facilitating education access and improving learning outcomes for all children. Involving diverse stakeholders directly in information gathering can be beneficial in helping them to understand problems and to identify solutions themselves.

Guidance on conducting a situational analysis focused on language-related issues pertinent to reading programs can be found in **Annex D**, *Conducting a language-specific situational analysis: Key steps to take and information to gather*. These steps, what they entail, and how information will be used are described in detail throughout this section. **Figure 5** summarizes key information and outcomes from the situational analysis.

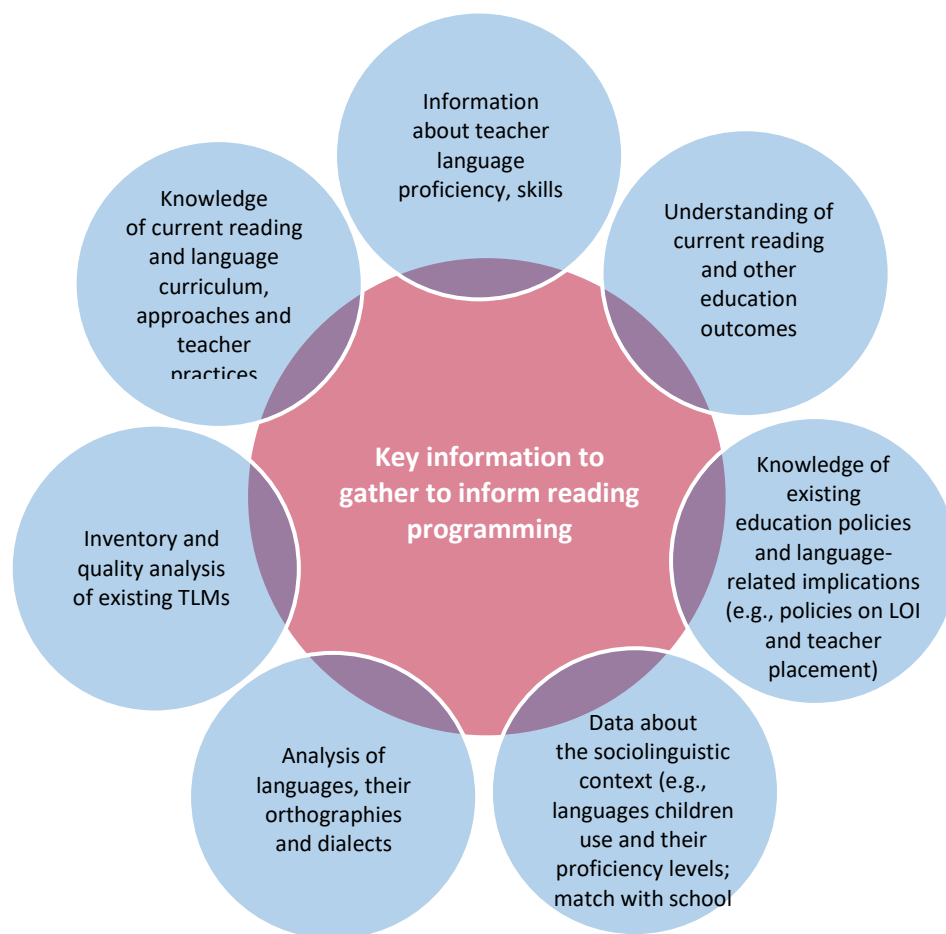
The guiding questions and list of information to gather included in **Annex D** aligns with those included in USAID's forthcoming *Literacy Landscape Assessment Toolkit*. This toolkit provides a comprehensive overview of information to gather when designing and expanding a reading program.⁶³

In conflict-affected areas, a contextual analysis of language issues can be embedded within a broader situational analysis, such as a Rapid Education and Risk Analysis (RERA), a process designed to better understand the state of education systems and learners in conflict- and crisis-affected areas.⁶⁴ During this process, careful attention should be paid to avoid making assumptions about the role of language in conflict. For additional information and resources related to language and conflict-sensitivity, consult the resources listed in **Annex C**.

⁶³ Henry F. Healey, Emily Morris, and Emily Kochetkova. *Literacy Landscape Assessment Toolkit*, resource developed by REACH and the GRN (Chevy Chase, MD: URC, 2019).

⁶⁴ James Rogan and Ashley Henderson, *Rapid Education and Risk Analysis Toolkit* (Washington, D.C.: USAID, 2018)

Figure 5. Aspects of a language-specific situational analysis: Key information to gather



3.1.4 Incorporate language issues into work plans and budgets

One common reason language-specific information is not gathered and activities are not undertaken is because they are not included in reading programs' initial work plans and budgets. It's therefore critical that donors and those who implement programs allocate the necessary time and funds to conduct them. A key activity to invest time and resources in is the situational analysis, since findings will inform the program design—and thus budget and work plan. If a situational analysis cannot be conducted prior to the release of a request for proposals, then time should be allocated during program start-up to conduct this important activity, with the knowledge that the proposed program design will likely change based on the outcomes of the situational analysis.

A broad range of stakeholders should be involved in developing the work plan and related budget to make sure that important language-related activities (described throughout this section) are included and that people are aware of what will take place. Specific tasks, who will be involved in them, and expected outcomes should be made clear as well.

3.1.5 Conduct a language mapping exercise

Reliable and up-to-date information about languages used in a country, in specific communities and in specific schools is essential to informing the design of a reading program, as well as policy and practice related to language use in education more broadly. An initial situational analysis may find a need to gather such information through a language mapping exercise. A language mapping exercise is a data collection exercise focused on collecting language-specific information about a particular population. It may be narrow or broad in scope, depending on the information needed.

Table 3 summarizes information that is frequently gathered through a language mapping exercise, how it is used, and examples of language mapping activities from recent reading programs. Summaries of these language mapping activities can be found in **Annex E**, *Language mapping experiences*, along with links to full reports.

During a language mapping exercise, information on what languages are spoken by children should ideally be conducted with both in-school and out-of-school populations. A language survey of enrolled students can help to identify which languages could and/or should be used for reading and language instruction. The information can be compared against official LOI policies to identify whether they are being implemented—and whether they are appropriate and effective.

Language mapping results for children *not* currently enrolled in school can help to identify what languages may need to be used in school to provide equitable access to education and facilitate equitable learning outcomes, since the reason some children may be out of school is because their language is not used for instruction. Information on the languages used by children who are not in school also could point to the need to use their language for reading instruction, and/or to provide them with instruction appropriate for second-language learners.

Table 4. Language mapping: Information to gather, how to use it, and examples from practice

Information to gather	Purpose(s)	Examples
Languages and dialects spoken and used by the population—particularly school-age children, including those both enrolled and not enrolled in schools	Identify whether the LOI assigned to a particular geographic area/school matches the L1/home languages/familiar languages used by children living in the area; identify if the LOI assigned to a specific school or region needs to be re-evaluated; identify what additional languages, and which dialects, should be used for reading instruction, and where; identify potential reasons for inequities in access and learning outcomes of certain sociolinguistic groups (e.g., lack of instruction in certain languages excludes certain children, such as children from ethnolinguistic minorities, deaf children, etc.).	Afghanistan - Afghan Children Read (USAID); See Annex E DRC ACCELERE! (USAID); See Annexes E & F
Children's level of oral/expressive language proficiency in specific languages and dialects	Identify the most appropriate languages to use for initial literacy instruction; identify children who may not have the oral/expressive language proficiency ⁶⁵ required to learn in the LOI; identify multilingual classrooms (in order to provide appropriate materials and identify instructional approaches that can be used to meet learners' needs).	Mozambique - Vamos Ler! (Let's Read!) (USAID); See Annex E DRC ACCELERE! (USAID); See Annexes E & F

⁶⁵ USAID is developing an assessment tool to gather information on children's expressive language skills. A list of available instruments for assessing oral/expressive language skills can be found in **Annex C**.

Information to gather	Purpose(s)	Examples
Teachers' language proficiency, knowledge use in classrooms, attitudes and beliefs, including: proficiency in specific languages, knowledge and skills related to teaching language; teacher attitudes and beliefs about languages and their use for instruction	Identify whether teachers have the knowledge and skills needed to provide effective instruction in specific languages; identify teacher PD needs related to language; identify how teachers currently use language in the classroom; identify teacher practices with respect to reading and language instruction; identify how teacher knowledge, attitudes and beliefs may facilitate or hinder their willingness to teach certain languages or use specific instructional strategies.	Nigeria – Reading and Access Research Activity (USAID); See Annex E for summary and report links Ghana Partnership for Education: Learning (USAID); See Annex E DRC ACCELERE! (USAID); See Annexes E & F
Information regarding “teacher-student language match,” at the school and classroom levels	Identify whether teachers and students are proficient in the same languages in order to: Identify changes to teacher school assignment policy and practice may that may be needed; assist teachers in contexts where they are not proficient in students' LOI.	Ghana Partnership for Education: Learning (USAID); See Annex E for summary and report links Mozambique - Vamos Ler! (Let's Read!) (USAID); See Annex E

Importantly, language mapping findings can help to dispel the many myths and beliefs about languages that tend to exist in any context and lead to improved stakeholder support for using languages children use and understand best for instruction. For example, a language mapping conducted in Mali in 2011 found that, contrary to the widely accepted belief that a particular area was too linguistically diverse for L1-based instruction to be feasible, all children in one region shared the same home language in 68% of schools, while in 90% of the remaining schools, the children/community used just four languages as a lingua franca or common language. By grounding the discussion on language policy and practice in evidence, the USAID program that supported the language mapping effort was able to advance the dialogue in a positive way.⁶⁶ **Example from practice 3** describes several recent reading programs' experiences conducting language mapping exercises.

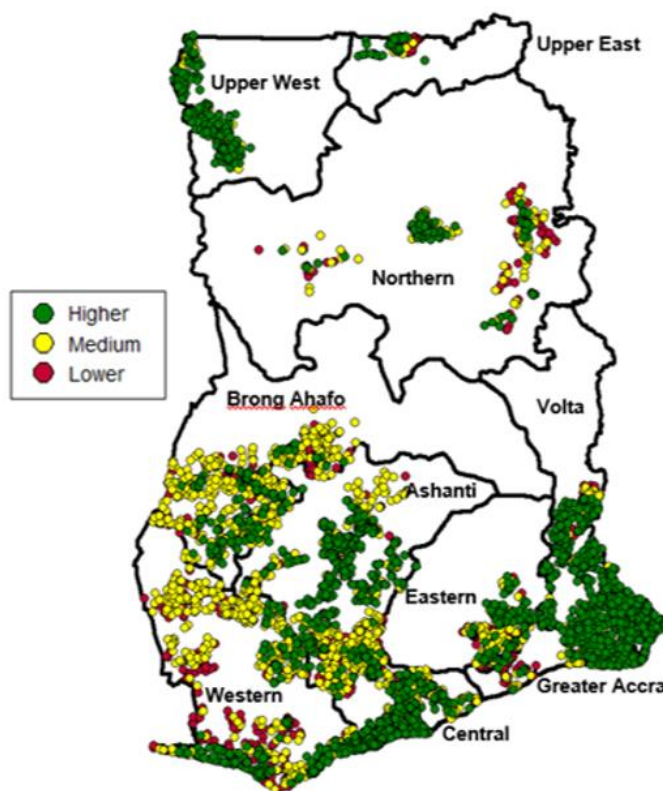
Ideally, language mapping should be conducted early on in the program planning process to inform its design. This is because findings will help to identify what languages and which dialects will need to be used for reading instruction in specific areas and schools; which schools are linguistically diverse and thus how instruction may need to be differentiated for different language learners; in which language(s) materials need to be provided; and whether issues of teacher-student language “match” will need to be addressed. Findings from language mapping can help to identify which languages are spoken by large proportions of the population, as well as which languages and dialects are spoken by minority or other marginalized groups. This information is critical to addressing disparities and inequities in education access and outcomes that may exist due to language, something reading programs can begin to address.

⁶⁶ USAID/Mali, Etude Sociolinguistique sur l'Adéquation Entre la Demande et l'Offre d'Enseignement Bilingue dans la Région de Mopti [Sociolinguistic study of the match between demand and supply of bilingual education in the Mopti region] (Washington, DC: USAID, 2011); Rebecca Rhodes, Moving Towards Bilingual Education in Mali: Bridging Policy and Practice for Improved Reading Instruction (PowerPoint slides), June 2012.

Example from practice 3:

Language mapping to inform reading program design and implementation

Many USAID-supported reading programs have recently conducted language mapping studies to inform and improve ongoing design and implementation. **Annex E** describes the experiences and findings from four countries. These examples provide helpful ideas and lessons learned. Programs that have not yet conducted a language mapping exercise are highly encouraged to read more about these countries' experiences (all of which took place after programs had been implemented for several years), as they provide insights into why a language mapping is useful, how to go about it, and tools for doing so.



A language map indicating the level of “teacher student match” in Ghana.
Credit: Reproduced from Ghana Learning Language Mapping Study, FHI 360, 2018

The findings from a language mapping exercise should be shared with all stakeholders and used to engage them in the process of identifying what languages to use for reading and language instruction, as well as for planning for language use in education more broadly.

3.1.6 Conduct language analysis and support language standardization

Just as a language map is essential to understanding what languages are spoken, by whom and where, an analysis of the languages themselves is required to inform decisions about what languages can be used for instruction, and what specific approaches should be used to effectively teach them.

In many cases, language analysis has already been conducted, in whole or in part, and existing information can serve as the foundation for additional analysis that may be needed.⁶⁷ Key language analysis information to find and issues to explore include the following:

- **Determine language “readiness,” or level of orthography standardization.** Before curriculum and materials can be developed, determine whether a language’s **orthography**—or symbols and rules used to write a specific language—is “ready” to be used for instruction. Such an assessment requires the technical expertise of linguists, who will work with language communities to review the orthography. In some cases, an orthography assessment may find that a language has a standard orthography and is ready to be used for instruction. In

⁶⁷ For example, language-related non-governmental associations, university-affiliated institutions, and organizations that develop religious text in specific languages can serve as sources of information about language readiness and other issues. However, it’s important to gather input from a variety of sources to verify and confirm information.

others, an orthography assessment may find that an orthography needs to be codified, or that different orthographies for the same language need to be standardized. Therefore, it's important to conduct an orthography review early in the program design phase, as it may inform the order in which materials are developed for specific languages, as well as the timeline for materials development. Investing the time and effort in orthography assessment upfront is well worth the effort, as some reading programs that have not done so have had to revise materials developed before a language's orthography had been reviewed and standardized. **Annex C, Resources for planning for language use in education** includes a list of resources to support orthography review, including an "orthography assessment score sheet" to assess "language readiness."

Key term: Orthography

An **orthography** is how the sounds of a language are represented in written form. An orthography includes symbols, punctuation, decisions about word breaks and other features.

In *transparent*, or shallow, orthographies, sound-symbol correspondence is consistent. In other words, a letter always represents the same sound in the language. Most African languages are written in transparent orthographies, while English, French, and Portuguese have less transparent orthographies.

In *opaque*, or deep, orthographies one letter may have more than one sound, or one sound may be represented by more than one letter (or both). If good instruction is provided, reading acquisition tends to take less time for orthographies that are transparent.

- **Analyze and consider language dialects.** In many countries where reading programs are implemented, one language may have many dialects, or varieties of a language, yet issues related to dialect have been greatly overlooked in reading programs to date, despite the profound impact dialect can have on children's ability to learn to read. The degree to which a dialect may differ from what has been identified or selected to be the "standard" version of a language will vary. In some cases, language dialects may differ in relatively minor ways and may be mutually intelligible, but in other cases the differences may be significant in terms of grammar, vocabulary and phonology.⁶⁸ Consultation and discussion with language experts, discussions with key stakeholders on dialect issues (such as the relative "prestige" of one dialect over another), and small-scale field testing of an instructional approach and materials in a specific dialect can be helpful in making choices about which dialect(s) to use for reading instruction. If materials are currently being used to teach children who speak and use different dialects of the same language, reading assessment results can be disaggregated by dialect (or a proxy variable) to help identify whether the instructional approach and materials are appropriate across dialects. An effort to understand how dialect issues may be affecting student reading outcomes in the DRC was recently undertaken in the DRC. Details can be found in **Annex E**.

⁶⁸ Jeffrey Reaser, Carolyn Temple Adger, Walter Wolfram, and Donna Christian, *Dialects at School: Educating Linguistically Diverse Students* (New York: Routledge, 2017).

Example from practice 4

describes a recent experience in Madagascar to analyze linguistic differences between “official” Malagasy and two dialects to inform the expansion of a pilot reading initiative. This analysis and the way in which it was conducted have had important, positive outcomes in terms of better understanding how dialect issues affect children’s reading comprehension and addressing what had long been a sensitive issue in the country.



Participants at a workshop in Madagascar discuss issues related to dialect and reading instruction.
Credit: Madagascar Mahay Mamaky Teny! (USAID), FHI 360

Example from practice 4:

Analyzing language dialects to improve reading instruction and outcomes in Madagascar

To better understand differences in reading outcomes and to support the Madagascar government’s Education Sector Plan objective to define a language in education policy that acknowledges the linguistic realities in the country, the USAID-funded “Mahay Mamaky Teny!” (MMT) conducted research to analyze similarities and differences of Malagasy dialects to Official Malagasy.

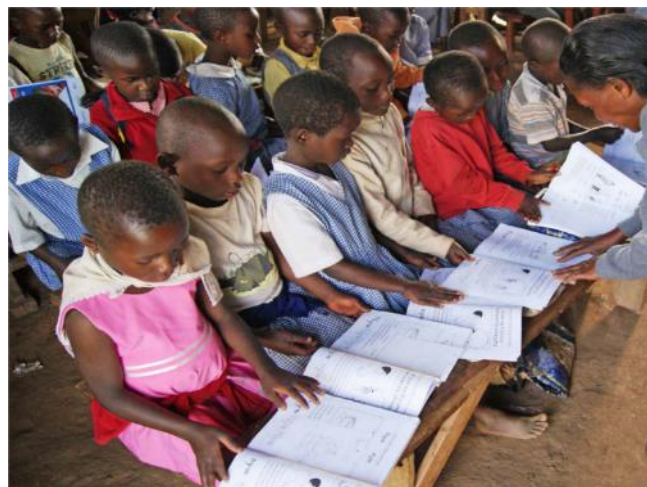
MMT conducted a lexical analysis of two dialects (Sakalava and Tsimihety), collaborating with community members, school directors, teachers, and parents who speak them. To generate a corpus of text to be analyzed that was comparable to Official Malagasy, MMT organized a workshop with educators and linguists in Sakalava and Tsimihety to generate vocabulary around the themes in the existing grade 1 textbook. To generate more authentic and culturally relevant text, MMT organized a workshop for Sakalava and Tsimihety speakers to share local stories, as well as collected stories from children and other community members. These stories were recorded, transcribed and reviewed by a linguist for spelling errors and grammatical consistency.

A software program (SynPhony) was then used to analyze the language dialects. The output served as the basis for a deeper analysis of the linguistic and lexical differences (e.g., differences in vocabulary) between Official Malagasy and the two dialects. The analysis found that Tsimihety and Sakalava have 68% and 70% of their basic vocabulary in common with Official Malagasy. (By comparison, French and Italian have 89% of basic vocabulary in common). This indicates learners who speak those dialects likely face significant challenges with reading comprehension of text in Official Malagasy.

The results of the dialect analysis were shared during a two-day workshop that included linguists, reading specialists, representatives of the Ministry of Education and other education stakeholders. The workshop provided a “safe space” for participants to learn about and discuss what had been considered a sensitive issue and to interact with and understand the real-life implications of the research on young learners, especially as they relate to early grade reading acquisition. The research findings and the workshop discussions are currently being used by the Ministry of Education to make informed decisions regarding the language in education policy.

Source: FHI 360, Education Program for USAID/Madagascar “Mahay Mamaky Teny!” Final Report (Washington, D.C.: FHI 360, 2018).

- **Learn about sign languages used in the country.** Sign languages are distinct languages from spoken languages, with grammar, vocabulary and syntax different from spoken language. More than 140 unique sign languages⁶⁹ are used worldwide. Learn about the sign language(s) used in the geographic areas where the program will be implemented to inform the design of an appropriate, effective bilingual approach for deaf learners.
- **Support orthography standardization.** Because standard written forms develop over time and with use, using a language for instruction actually fosters development. However, for languages without established orthographies or writing systems, a minimum level of standardization should be achieved before teaching and learning materials are developed, to ensure consistency across teaching. If a language has not yet been standardized, engage in a process to support orthography standardization and terminology development for academic use. One recent example of this process being undertaken by a USAID-supported reading program comes from Uganda, where a health and reading program is assisting in developing both assessments and teaching and learning materials in 12 national languages plus English (see **Example from practice 5**). Universities, language experts, local NGOs, or linguistic organizations such as SIL International can be tapped to help develop and standardize writing systems, as well as to develop terminology specific to reading programs. Resources describing experiences, tools and processes to support orthography analysis and language standardization are listed in **Annex C**. (Note that standardization of an orthography is not the same as using a “standard” version of a language that may have many dialects.)



Children reading in Uganda (see Example from practice 5).
Credit: Uganda SHRP/LARA (USAID), RTI International

Example from practice 5:

Orthography standardization: A critical step to providing L1-based instruction in Uganda

Prior to developing reading materials in 12 Ugandan languages under the School Health and Reading Program, project staff worked intensely with technical experts to ensure that several orthographies (language writing systems) that were new or for which consensus had not yet been established were reviewed and standardized. Over approximately six months, the project team and advisors helped establish or strengthen 12 local language boards; conducted orthography review workshops for each language; prepared 30- to 50-page orthography guides; and collaborated with the language boards to discuss, correct, amend, validate, and adopt the writing systems. The project team then trained writers in the standardized orthographies, assisted in compiling appropriate vocabulary lists for each language, and oversaw the authors' practice in reading and writing their languages. Teaching and learning materials were then developed using the agreed-upon orthographies.

Source: Case study reproduced from Alison Pflapsen et al., *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes*, 2016. Original source: RTI International, *USAID/Uganda School Health and Reading Program, Annual Report, May 2012–September 2013*.

⁶⁹ David M. Eberhard, Gary F. Simons, and Charles D. Fennig (eds.), *Ethnologue: Languages of the World*. Twenty-second edition (Dallas, Texas: SIL International, no date). See the section on sign languages: <https://www.ethnologue.com/about/problem-language-identification>.

- **Analyze similarities and differences between languages that may or will be used for instruction.** Language analysis should be undertaken to better understand the nature of the languages and dialects that are currently used, or may be used, for reading instruction. An analysis of the properties of specific languages will help to inform the approach to and the content of instruction in significant ways. (For more information on key reading skills and how they are taught, consult the Global Reading Network’s webinar on this topic.⁷⁰) It will be important to understand the similarities and differences between languages that children will learn to read concurrently. Language analysis is also critical to understanding whether differences in a language’s dialects are significant enough to merit the development of separate curriculum and material.

3.1.7 Identify languages to be used for reading instruction

Decisions regarding which languages (and possibly which dialects) to use for reading instruction should be informed by knowledge of the context and research and evidence on use of L1 and L2/Lx for teaching and learning (consult **Section 2** for a summary). The following factors should help stakeholders to identify which languages to use for reading instruction and, ideally, in other subjects:

- **Educational context and language learning goals.** A country may have a language of instruction (LOI) policy indicating what languages should be used in schools. It’s also helpful to be knowledgeable about a country’s education goals, which may or may not align with how language is used in schools. This information can help support decisions related to the languages used for reading instruction. In situations where an LOI policy does not explicitly state which languages should be used, does not align with the sociolinguistic context, and does not reflect evidence-based best practices, reading programs are encouraged to engage with government partners to identify what languages could be used, at least initially, to test a new approach to teaching children to read.
- **Sociolinguistic context.** Findings from a language-focused situational analysis, language mapping study, and review of orthography and existing materials can help to identify which languages would be most feasible and appropriate to use for reading instruction, and ideally to use for instruction across the curriculum. Care should be taken to balance the need to select languages spoken and used by a large proportion of the population with those spoken and used by minority language groups, as it may be critical to use these groups’ languages to address disparities and inequities in education access and outcomes that may exist.
- **Orthography readiness.** A language cannot be used for reading instruction if its orthography has not been standardized for use. The “readiness” of some languages over others may therefore guide the sequencing of the languages for use in a reading program. However, languages that have not been standardized should not necessarily be excluded from being used for instruction. Rather, efforts should be made to encourage host government counterparts to consider standardizing them
- **Similarities between languages.** The development of curriculum and materials is usually more efficient for languages that are similar to each other than those that are significantly different. Give this, it may be prudent to use languages that are similar to each other, at least initially, and then expand to using languages that are less similar to each other.

⁷⁰ Adrienne Barnes, Amy Pallangyo, and Young-Suk Kim, *Key Early Grade Reading Skills and Strategies for Effective Instruction and Assessment* (webinar), Global Reading Network, July 17, 2019.

- **Equity and inclusivity.** All children need opportunities to learn. Limiting access to schooling to certain ethnic or linguistic groups due to the language they speak is a form of social and political inequity. Children with visual or auditory impairments also need equitable opportunities to learn, which means using Braille and sign language alongside spoken languages for reading instruction.⁷¹
- **Teachers' knowledge and skill level.** The availability of teachers to teach in certain languages, teachers' proficiency in the languages in which they will be expected to teach reading and subject-matter content, and teachers' knowledge and skills regarding language and reading instruction are critical to decision-making.
- **Availability of teaching and learning materials (TLMs).** The availability of appropriate, high-quality resources is a prerequisite for teaching reading in a given language, for teaching the language as a subject, and for teaching curricular content in the language. Therefore, programs may decide to use languages for which materials are already available. However, the lack of TLMs should not disqualify a language from being used for reading instruction and may point to a need for that language to be prioritized for inclusion in a reading program. (The availability of software and other resources, as described in **Section 3.3, Resources for teaching and learning**, can facilitate rapid development of reading materials.)
- **Timeline and funding available.** A decision about which languages to use for instruction will also depend on the amount of funds and time available. It's important to remember that each additional language used for reading instruction, and instruction across the curriculum, may not necessarily cost the same amount, since some costs will be the same no matter how many languages are included, while others may apply to each language. See **Section 3.3.6, Consider cost and supply chain issues** for a more detailed discussion of cost considerations.

In countries where hundreds of languages and dialects may be used, initial efforts to improve reading outcomes, and how language is used in the education system more broadly, may need to target a select number of languages that reach the most children, have a standardized orthography, and have sufficient materials and teachers for instruction, with additional languages added over time as resources become available. However, due to political dynamics, or given a history of inequality among certain sociolinguistic groups (such as a particularly low rates of school enrollment or achievement among users of certain languages), languages spoken by a smaller percentage of pupils may need to be prioritized as well to mitigate these factors. (In some cases, smaller languages may also have more established orthographies, as was the case in Uganda.)

In countries with multiple languages, staggering the introduction of additional languages for instruction can be helpful, as lessons learned from experiences working to provide instruction in one language (e.g., standardizing orthography, developing curriculum and materials, etc.). Moreover, successful pilot efforts can serve to build awareness and support for the use of additional languages or dialects for reading instruction and across the curriculum more broadly.

⁷¹ Sign languages are distinct languages from spoken languages, with grammar, vocabulary and syntax different from spoken language. Braille, on the other hand, is a tactile representation of a spoken language and not a distinct language.



Stop and reflect: Foundational planning

Activity 3: This activity provides an opportunity for individuals and/or program teams to “take stock” of the Foundational Planning steps to identify any they have not undertaken and how to improve upon what they have done. Review the steps described in **Section 3.1, Foundational planning**. Indicate whether the step was successfully conducted, conducted but with gaps, or not conducted. Identify how to improve upon gaps.

Step	Successfully conducted	Conducted, but with gaps	Not conducted	How we can improve
Engage and involve diverse stakeholders				
Conduct situational analysis (Review the list of specific activities in Annex D)				
Develop work plan and budget that considers language issues				
Conduct a language mapping exercise				
Conduct language analysis and support language standardization				
Identify languages to be used				

Activity 4: Turn to **Annex D, Conducting a language-specific situational analysis: Key steps to take and information to gather**. Read the list of steps and related information to gather. Put a checkmark next to the information that your reading program has gathered. Circle any information your program has not yet gathered. Discuss with your team how gathering the missing information could be useful.

3.2 Instruction and Assessment

Before you begin: Pre-reading reflections

Before you read this section on Foundational Planning, reflect on the following:

- Which stakeholders have been involved in discussions, decisions and activities related to language use in reading programs? What challenges and successes have you encountered?
- What information about language has been gathered to inform the reading program? What additional information do you think is needed?
- What questions do you have about how reading programs can integrate language-specific issues into their planning?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

An understanding of language issues is central to designing a quality approach to reading instruction and assessment. This section includes guidance on the steps to take to develop an appropriate, effective approach to reading and language instruction that incorporates evidence-based good practices.

Additional tools to support the design of a new approach to instruction in a specific language—or the modification of an existing one—are mentioned throughout the section and listed in **Annex C**. To support individuals and teams involved in reading programming, the Global Reading Network webinar short-course and resource package *Key early grade reading skills and strategies for effective instruction and assessment* is recommended.⁷²

Key ideas: Instruction & Assessment

- ✓ A review of the current curriculum and instructional practices used in classrooms will inform a new approach to language and reading instruction, as well as help to identify teacher professional development needs.
- ✓ An analysis of a language (and its dialects) is necessary to identify an appropriate, language-specific scope and sequence and instructional approaches for teaching reading; language analysis software can support this process, which should involve reading specialists, linguists and teachers.
- ✓ Use language mapping findings to identify the existence of multilingual classrooms and to develop an appropriate approach to instruction in these contexts.
- ✓ In contexts where learners are expected to learn more than one language, identify language competencies and vocabulary thresholds that can be used to determine whether learners have the skills they need to be successfully learn an additional language.
- ✓ Assessments for all purposes should align with the languages being taught and the instructional approaches being used to best assess what children know; multilingual assessments should be used to gain a holistic understanding of children's knowledge.

⁷² Adrienne Barnes, Amy Pallangyo, and Young-Suk Kim. *Key Early Grade Reading Skills and Strategies for Effective Instruction and Assessment* (webinar presentation, Global Reading Network, July 17, 2019).

3.2.1 Analyze current curriculum, instructional approach and delivery

As previously discussed, a situational analysis to inform the development of a reading program or approach to language use in education more broadly should include an analysis of the existing curriculum, instructional approaches and delivery. This includes reviewing the following, for which specific questions are detailed in **Annex D**, *Conducting a language-specific situation analysis: Key steps to take and information to gather*.⁷³

- **Curriculum:** The curriculum for teaching children to read, for teaching languages as subjects, and the approach for teaching literacy and language across the curriculum needs to be analyzed. Understanding what existing curricula include and what gaps exist should be used to inform a collaborative process of developing a new or modified approach to reading and language instruction.
- **Instructional approach:** The approach to instruction, or the strategies and methods that a teacher uses to teach students (see Key Term textbox), needs to be reviewed to assess if it aligns with the evidence-based strategies for effective reading outlined in **Section 2**, or if gaps exist. An analysis should also assess whether the instructional approach is appropriately differentiated for students learning to read in their first language and students learning to read in their second or additional language, whether the approach is specific to the language being taught, and whether the approach is appropriate for students with specific needs, such as those that are deaf or hard of hearing and/or blind or visually impaired. Another important piece of information to gather is whether the current approach for reading instruction has ever been evaluated, and if so, what are the findings.
- **Instructional delivery:** While the curriculum may be defined on paper, it's important to understand how it is implemented in classrooms. Questions to guide an investigation of instructional delivery include: Are teachers adhering to guidance on how to teach reading and to teach language? Do teachers have sufficient skills and knowledge within the language to provide instruction? This information is critical to understanding what skills teachers bring to the classroom that can be incorporated into teacher's guides, and which ones will need to be improved through targeted professional development.

3.2.2 Analyze language to inform instructional approach

As discussed in **Section 2**, a significant body of research exists on the most effective approaches for teaching reading and language. However, while quality instruction has some universal elements, languages have unique characteristics that may require instruction be differentiated in some ways, depending on the properties of the

Key term: Instructional approach

An instructional approach is the strategies, methods and materials that a teacher uses to teach students. The evidence-based approach to literacy instruction commonly used in USAID-supported reading programs is explicit instruction, which focuses on teaching specific reading and writing skills. (The way in which these skills are taught may differ depending on the language.) To learn more about USAID's support for evidence-based approaches for reading instruction, consult: *Promoting Successful Literacy Acquisition through Structured Pedagogy* (Kim, Y-S & Davidson, M., 2019) and other resources described in **Annex C**.

⁷³ USAID's *Literacy Landscape Assessment Toolkit*, developed by REACH, also includes information on these topics.



A girl in Ethiopia writes in an alpha-syllabic script (see Example from practice 6). Credit: Ethiopia EdData II (USAID), RTI International

specific language.⁷⁴ Therefore, an initial first step to identify and design an instructional approach is to **analyze the specific languages that will be used**. For example, it's important to know and analyze: Language type, degree of transparency (e.g., degree of sound-symbol correspondence represented in the orthography), and symbols (letters and graphemes) and sounds that need to be taught. All of these will affect content and instructional strategies, and how long it may take children to learn to read. See **Example from practice 6** about how reading approaches for alpha-syllabic scripts were developed in Ethiopia and Nepal.

Similarities and differences between languages (and between dialects of the same language) need to be analyzed to identify the most appropriate approach for teaching specific languages as L1, as L2/Lx, and for teaching them concurrently, if required. This includes identifying similarities and differences related to language type (e.g., alphabetic, syllabic or alpha-syllabic), directionality (e.g., read from left to right), symbols and sounds, and grammatical features. The curriculum for teaching reading and the curriculum for teaching language need to account for differences and similarities, and instructional approaches need to be developed to support teachers and students in their bilingual or multilingual learning.

Example from practice 6:

When there is no road map: Identifying an approach to teaching alpha-syllabic scripts in Ethiopia and Nepal

While much evidence exists on how to best teach alphabetic languages (such as English and French), less research has been conducted on specific instructional approaches for developing critical early grade reading skills in alpha-syllabic scripts, such as Nepali, Amharic and Tigrinya. Given the lack of evidence on the most effective way to develop certain reading skills in these languages, early grade reading programs in Nepal and Ethiopia are developing an instructional approach based on linguistic analysis of specific languages, adaptation of instructional approaches used to teach alphabetic scripts, and local practices. For example, while students learning to read English are taught to isolate the sounds of different phonemes, sound isolation is not necessarily so appropriate for the Nepali or Amharic languages given the linguistic characteristics of these languages. As a result, reading instruction focuses more on comparing minimal pairs, or words that differ by only one phonological element (e.g., sound) but have different meanings (for example, “sip” and “zip” in English). Syllable clapping, a common activity used to support English reading instruction, can be more complicated in these alpha-syllabic languages, and so had to be adapted for Amharic, Tigrinya and Nepali and focuses on certain types of words that are more appropriate for this instructional strategy. These experiences illustrate the importance of drawing on evidence-based good practices when developing an instructional approach, but also the need to conduct language-specific analysis to make informed decisions when research does not exist.

Source: Wendi Ralaingita and Agatha J. van Ginkel, *Balancing Linguistic and Contextual Factors: Lessons Learned from Supporting Reading in Three Alpha-Syllabic Script Languages*, presentation at the annual conference of the Comparative and International Education Society (CIES), 2018.

⁷⁴ Leila Schroeder, “Teaching and Assessing Independent Reading Skills in Multilingual African Countries: Not as Simple as ABC,” in Carol Benson and Kimmo Kosonen, *Language Issues in Comparative Education: Inclusive Teaching and Learning in Non-Dominant Languages and Cultures* (Rotterdam, The Netherlands: Sense Publishers, 2013): 245–264; Barbara Trudell and Leila Schroeder, “Reading Methodologies for African Languages: Avoiding Linguistic and Pedagogical Imperialism,” *Language, Culture and Curriculum*, 20, no. 3 (2007): 165–180.

Part of this process may include conducting a frequency analysis of letters and graphemes to help identify an appropriate scope and sequence for teaching specific languages. (Scope refers to the content to be taught at a specific grade level, and sequence refers to the order in which the content is taught. The scope and sequence for teaching children to read will be different for different languages.) Software can be used to support language analysis and the development of a language-specific scope and sequence. A list of software and resources that have been used in USAID-supported reading to support language analysis is included in **Annex C**.

3.2.3 Develop (or modify) reading curriculum and instructional approach

Once the appropriate language and dialect analysis has been conducted, the next step is to develop a reading curriculum that takes into consideration the specific language and context. In some contexts, a reading program may decide not to modify a country's official curriculum, but to develop a pilot version. (Some pilots may refer to this as a scope and sequence for a given language, rather than a curriculum, to avoid confusion with a country's official curriculum.) Once a pilot curriculum has been tested and evaluated, the official curriculum is then modified.

Curriculum development/modification includes the following tasks:

- **Identify team to conduct the work.** A multidisciplinary team including reading specialists, linguists, relevant government authorities, and speakers of the relevant languages and dialects should be engaged to develop/modify the curriculum.
- **Develop (or refine) a scope and sequence** (e.g., what is taught and when) based on the specific properties of the language and the language analysis findings. The scope and sequence should be designed to facilitate children's ability to read as quickly as possible. This will likely mean *not* introducing letters in alphabetic order, but in the order that maximizes the number of words a child would be able to decode as they learn additional letters/graphemes. The scope and sequence for languages that will be taught concurrently should be aligned to the greatest extent possible to support efficient, effective instruction. **Example from practice 7** describes how one reading initiative modified the scope and sequence for the Khmer language in Cambodia to support more efficient teaching and learning.



Girls in Cambodia practice reading in the Khmer language (see Example from practice 7).
Credit: Room to Read

Example from practice 7:

Focusing on orthography to improve instruction: The case of Cambodia

To support improved reading outcomes in Cambodia, Room to Read collaborated with government language and reading specialists to identify ways in which the instructional approach and materials used to teach the Khmer language could be adapted. The process began with a review of Khmer, a complex language in terms of the number of graphemes (71) and phonics skills, number of strokes per letter, density of script and similarity between letters. The language review identified several ways in which literacy instruction could be modified to account for specific orthographic features unique to Khmer. Room to Read developed supplementary student books and teacher's guides that accounted for these language complexities to align with textbooks developed by the Cambodia Ministry of Education, Youth and Sport (MoEYS). In addition to introducing five consonants before the vowels to allow for the earlier introduction of decodable text, student books with syllable grids, word grids and decodable text were designed to give children practice with each new phonics skill they learned. Teachers were then trained and coached on the new approach and resources. An initial assessment of the new instructional approach and materials found an improvement in children's oral reading fluency and comprehension compared to that of children not exposed to the new approach and materials. Room to Read is applying this experience in its work with a consortium of partners to develop a harmonized approach to early grade reading instruction for children in kindergarten and grades 1-3. This five-year early initiative (2017-2021) is supported by the U.S. Agency for International Development.

Sources: Christabel Pinto, *Negotiating Language Complexities and Government Policies for Khmer Instruction*, presentation at the annual conference of the Comparative and International Education Society (CIES), 2018; USAID/Cambodia, "Education and Child Protection," last modified August 23, 2019

- **Develop an instructional approach** to teaching language and literacy that reflects research-based evidence, the specific languages to be used, and the context. **Example from practice 8** describes how the instructional approach was adapted across the 11 languages used for early grade reading instruction in Ghana. Other resources on evidence-based approaches are included in **Annex C**.
- **Develop a bilingual approach to instruction**, including for children who are deaf or hard of hearing. In many contexts, children will be expected to learn to read in more than one language. **Section 3.2.4, Develop an evidence-based approach to support bi- and multilingual reading and language instruction** provides more details on how to do so.



The approach to reading instruction in Ghana was informed by an understanding of the orthographic and grammatical features of the 11 languages used (see Example from practice 8). Credit: Ghana Learning (USAID), FHI 360

Example from practice 8:

Developing an appropriate instructional approach for Ghanaian languages

Developing an effective approach to reading instruction requires attention to the linguistic features of the language being taught. In Ghana, the USAID-supported *Learning* program recently updated reading teaching and learning materials for 11 languages. This process focused on analyzing each language's orthographic features (e.g., characteristics of the writing system) and grammatical features. The team used Primer Pro software to assist in the process of inventorying graphemes (e.g., sounds of the language) and identifying the most productive order for teaching them. Other issues taken into account included the grammatical structure of the language, the fact that many words are not decodable (like in English), and ambiguous word meanings (the Ga word *yoo*, for example, has 22 meanings). The instructional approach thus accounted for these issues. For example, a phonics-based approach to instruction is used until students need to learn ambiguous graphemes with more than one meaning. For these graphemes, learning activities that help children learn to recognize use of the graphemes in different contexts is needed. Importantly, the language analysis process was conducted in collaboration with Ghanaian language experts and education leaders to obtain consensus on the approach developed.

Source: Barbara Trudell, *The Role of Linguistics in the USAID Partnership for Education: Learning Activity in Ghana*, presented on the panel: Developing Early Grade Reading Materials in 11 Languages: Learning in Ghana at the annual conference of the Comparative and International Education Society (CIES), 2018.

3.2.4 Develop an evidence-based approach to support bi- and multilingual reading and language instruction

In contexts where children are expected to gain literacy skills in more than one language (including signed language), the curriculum and approach to teaching children to read, and teaching them language and literacy skills in an additional language, need to be grounded in the evidence summarized in **Section 2: Effective reading and language instruction—What works?** and adapted to the particular languages and context.

With this in mind, reading programs are encouraged to:

- **Concurrently develop separate but aligned curriculum (or scope and sequence) for the target languages** to facilitate children's transfer of knowledge from one language to another. For example, under the USAID- and UK Department for International Development (DFID/Kenya)-supported Kenya Primary Math and Reading (PRIMR) Initiative, English-language instruction was designed such that letters of the alphabet that were similar to those in Kiswahili were introduced first, to build on children's existing knowledge in a more familiar language.⁷⁵
- **Focus on building children's literacy skills in their L1.** This includes teaching key reading skills and developing an approach to instruction that is appropriate for the language.

⁷⁵ Benjamin Piper, Leila Schroeder, and Barbara Trudell, "Oral Reading Fluency and Comprehension in Kenya: Reading Acquisition in a Multilingual Environment," *Journal of Research in Reading* 39, no. 2 (2015): 133-152.

- **Begin teaching L2/Lx oral language skills** to build a foundation for later literacy instruction in the additional language.
- **Use appropriate instructional practices and materials** for teaching children language and literacy skills in their L2/Lx. Work with experts in second language instruction to develop an approach that is appropriate. Materials that support the teaching and learning of the L2/Lx language also need to be developed.
- **Explicitly teach children similarities and differences between languages, and how to transfer specific literacy skills.** As noted previously, interlinguistic transfer does not happen automatically or across all skills for all languages. Teachers will need guidance on both content and approach to use.

For children who are deaf, hard of hearing or deafblind, a bilingual approach to instruction is also required to help them learn to read a written/spoken language as well as to communicate using sign language. Consult with the deaf community in a particular country to identify what language “pairs”—e.g., which signed language and which written/spoken language—should be used. **Annex C** includes resources on how to develop an appropriate bilingual approach for children who are deaf or hard of hearing.

As previously noted in **Section 2**, transition from one LOI to another should take place *only when* important conditions have been realized, such as: Children have acquired sufficient proficiency in the language to learn academic concepts *in* the new language; sufficient instructional time is available for teaching two languages; teachers are sufficiently proficient in the L2/Lx to teach children the language as a subject *and* to teach subject content in those languages; and teaching and learning materials geared toward children learning *in* a second language are available. Once implemented, the approach to bilingual or multilingual literacy instruction should be evaluated to identify whether the intended outcomes are being achieved.

Textbox 3 discusses factors to consider in contexts where instruction in three languages takes place, or is desired.

Example from practice 9 describes a USAID program supported in the Philippines to develop and implement a trilingual approach to reading instruction



In the Philippines, children's reading development is supported by building a bridge from one language to another (see Example from practice 9). Credit: Basa Pilipinas (USAID), Education Development Center

Example from practice 9:

Supporting reading acquisition across languages: Bridging in the Philippines

During the 2012-2013 academic year, the Philippines Department of Education (DepEd) launched a new policy to support mother tongue-based multilingual education. It required children in grade 1 to be taught to read in the mother tongue language identified for their region, with Filipino and English taught as oral language subjects. In grade 2, students are introduced to reading and writing in Filipino and to reading in English. However, the mother tongue remains the language of instruction (through grade 3). In grade 4, English becomes the LOI for math and science, with Filipino used to teach other subjects.

The USAID Basa Pilipinas initiative supported the DepEd to implement the new LOI policy in select regions. This support included collaborating with government to design an instructional approach and materials to support children's learning across three languages through bridging. Bridging is an instructional approach that helps learners transfer their knowledge of one language to another. To support bridging, under Basa Pilipinas teachers learned how to explicitly teach what is the same and what is different in the mother tongue, Filipino and English languages. This includes teaching similarities and differences in sound-symbol correspondence, word structure, grammar and syntax, among other areas. To support the application of bridging strategies, Basa Pilipinas developed teacher's guides that include information on how and when to use bridging. Videos developed to support teacher professional development also include information about strategies and activities teachers can use in the classroom to support bridging. This includes helping students to recognize cognates across languages, comparing and contrasting verb forms in the three languages, or having children develop cross-linguistic vocabulary skills through writing and drawing activities. Basa's grade 1, 2 and 3 teacher's guides for English and Filipino were officially adopted by DepEd for use nationwide by public schools across the country.

Source: Susan Bruckner and Dina Ocampo, "Basa Pilipinas Support to DepEd's MTB-MLE Policy Reform," *Language Policy, Planning and Practice in Reading Programs*, GRN webinar, 7 March 2018

3.2.5 Develop approach to instruction for multilingual classrooms

As discussed in **Section 3.1.5**, language mapping will shed light on which languages and dialects are spoken and used in communities and classrooms and children's and teachers' level of proficiency in different languages. Through this process, a program might find that some communities and classrooms are multilingual, such as those in urban environments or in areas where people have been displaced from their homes due to conflict, natural disasters or other issues. In such cases, decisions need to be made about what language to use and what approach to instruction is most effective and feasible.

It's worth emphasizing, however, that even in multilingual countries, the majority of schools are likely to be monolingual. This point is important to underscore since the "problem" of large numbers of multilingual classrooms is often raised, without evidence, as a reason not to implement any L1-based instruction. However, even in urban environments, monolingual schools are not uncommon given the ethnolinguistic composition of neighborhoods. Reliable, up to date information about a context needs to be used to inform decisions (and dispel myths) about what languages are most appropriate and effective to use in specific schools and areas.

The traditional "solution" for providing instruction in multilingual environments has often been to select a language not familiar to any group—e.g., a foreign or ex-colonial language, believing it is "neutral" and prevents favoritism. However, as previously discussed, evidence indicates children will be more successful if they first learn to read in a language that is already familiar to them, such as a language of wider communication used in their community or on the playground. The following strategies, drawn from Benson and Young (2016) and van Ginkel (2016), provide ideas for programs on how they might deliver reading instruction in multilingual classrooms, keeping in mind that solutions may be dependent on the resources available, and should be trialed on a small scale before they are used more broadly:

Textbox 4. Factors to consider for trilingual instruction

In certain contexts, stakeholders may express a desire to teach children to read and learn in three languages: their home language (L1), a national language/lingua franca (L2) and an "international language" such as English (L3). Children are expected to be able to learn in the three languages by approximately grade 4, with instruction then provided exclusively in the national language and/or the international language.

While the rationale for a trilingual approach to instruction may be understandable, research and experience in countries that have implemented it indicate that children are not able to acquire sufficient proficiency in three languages by the end of grade 3 (for example, in Malawi and the Philippines). Moreover, they are not able to learn *in* the L2 or L3 by grade 4.

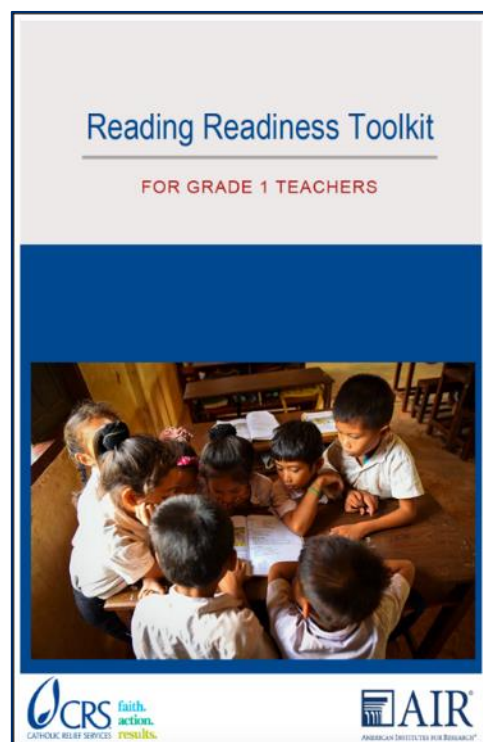
Given this evidence, countries that wish to support trilingual language acquisition are encouraged to considering the following approach:

- Focus instruction through the end of primary school on developing strong L1 reading and writing skills.
- Provide instruction in L1 throughout primary school to support academic learning across content areas.
- Introduce the L2 and L3 gradually, as a subject (as opposed to using it as an LOI), especially if instructional time is limited.
- Identify when children are ready to begin learning an L2 or Lx. In multilingual environments, this may mean some children may be able to start learning in an additional language sooner than others.
- Depending on the context (e.g., children's and teachers' proficiency), defer teaching *in* the L2 and L3 until secondary school.

Source: Reproduced from Alison Pflepsen et al., *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes* (Washington, D.C.: RTI International, 2016).

See also: Carol Benson, "Trilingualism in Guinea-Bissau and the Question of Instructional Language," in *Trilingualism in Family, School and Community*, edited by Charlotte Hoffmann and Jehannes Ytsma, 166–84 (Clevedon, UK: Multilingual Matters, 2003).

- **Identify learners' strongest languages.** In some contexts, children may be highly proficient in more than one language, including a language of wider communication (LWC). Assessment results can help to identify what these are, and whether children have the foundational oral/expressive languages skills necessary to successfully learn to read in that language (and possibly also learn academic content). This process may help to identify a manageable number of languages to use, such as two or three, in multilingual areas or schools.
- **Provide remediation to support children's acquisition of the language of instruction.** In classrooms where only one language can realistically be used (due to LOI policy constraints, lack of teachers or materials, or other factors), learners whose language is not officially used for instruction can be supported through remediation, which might take place during or after school. Remediation might be led by the teacher or supported by a teaching assistant, such as a community member, other teacher, or fellow student who speaks and uses the language. Teachers and/or assistants could be trained to provide targeted support to children to build their oral language skills in the LOI, as well as to help them transfer language skills. See **Example from practice 10** for a description of how teachers in Laos were supported to provide instruction to non-Lao speaking children.
- **Organize classrooms by language.** Group learners by language, either within a grade or across grades, depending on the number of learners, ability levels, and teacher capacity. In Ethiopia, for example, learners in some schools are divided into two streams by language.⁷⁶ If students are grouped by language across multiple grades, teachers need to be skilled at teaching in a multi-age/multi-grade classroom. However, the approach could also be used for initial reading instruction, with students eventually transitioning to learning in the same language once they have acquired sufficient proficiency to learn that language.
- **Implement a dual-language immersion approach.** In this approach, students learn from each other with the goal of developing oral and written proficiency in both languages. Such an approach might be particularly appropriate in contexts where the two languages used are related and share orthographic features.
- **Use multilingual teachers.** In contexts where children are multilingual, teachers are likely to be, too. Assessing teachers' proficiency across languages, providing them with the professional development needed, and providing them with the support and guidance they need to provide instruction in multiple languages will be key.
- **Provide multi-language materials.** Support instruction in multiple languages in the same classroom by providing materials in multiple languages.



Teachers in Laos learned strategies to support non-Lao speakers in the classroom (see Example from practice 10). Credit: CRS/AIR

⁷⁶ D.T. Gemechu, *The Implementation of a Multilingual Education Policy in Ethiopia: The Case of Afaan Oromoo in Primary Schools of Oromia Regional State*. University of Jyväskylä, 2010, as cited in Agatha J. van Ginkel, *Additive language learning for multilingual settings* (Washington, DC: JBS International, 2014).

The strategies listed above should be developed and piloted on a small scale to identify what is most appropriate for a particular context, and to gain stakeholder buy-in on an approach (or approaches) to expand to more schools.

Example from practice 10:

Piloting an approach to teaching second language learners of Lao

The Lao People's Democratic Republic is a multi-ethnic and multi-linguistic country. All children are expected to learn to read Lao when they begin school, even if it is not their L1. The policy creates multiple challenges for effective teaching and learning. Teachers have limited knowledge of effective pedagogical practices for teaching children with limited or no exposure to the Lao language, either orally or in print. As a result, children have low student reading scores and struggle to learn in other subjects.

To support teachers and students in a country where the policy does not currently allow for L1-based instruction, Catholic Relief Services (CRS) and American Institutes for Research (AIR) collaborated to develop resources and professional development opportunities for grade 1 and 2 teachers to improve Lao language instruction for Lao- and non-Lao speaking students. The program consisted of a package linking classroom assessments and remedial teaching practices, focusing on helping teachers build second-language learners' emergent literacy skills, and is tailored to the so-called "alpha syllabic" writing systems of South and Southeast Asian orthographies.

A qualitative evaluation of the program was conducted, and the results indicated that: (1) the toolkits were easy to use and helpful for teaching Lao; (2) the program was implemented with fidelity for the most part; and (3) teachers and other education stakeholders perceived positive effects on student literacy outcomes. The evaluation also pointed to the need for further coaching and alignment with the existing curriculum. Overall, stakeholders reported that they would benefit from program expansion.

Source:

Kaitlin Carson, Jamie McPike, Kevin Kamto, Adria Molotsky, and Pooja Nakamura. *Development and Evaluation of the Lao Child Literacy Development (CLD) Pilot* (Washington, D.C.: American Institutes for Research and Catholic Relief Services, 2018).

3.2.6 Align assessments to the languages, curriculum and instructional approach

The development of language-specific reading curriculum and instructional approaches needs to be accompanied by efforts to align the language(s) used for *assessment*. This includes aligning classroom-based formative and summative assessments; national school leaving or entrance exams; national learning assessments that may be periodically conducted; and international exams to the languages that best allow children to show what they have learned.

Teacher training programs should emphasize the importance of continuous assessment in the language children know best to avoid confounding their language abilities with their content knowledge.⁷⁷ This includes providing opportunities for children to show what they have learned in their L1 as well as their L2, even if content is taught in the L2. Reading programs also need to make sure they integrate assessment into the process of developing materials, particularly into the teacher lesson plans.

⁷⁷ To learn more about formative assessment, consult Young-Suk Kim and Marcia Davidson, *Assessment to Inform Instruction: Formative Assessment*. GRN Critical Topics Series (Chevy Chase, MD: URC, 2019).

Bi- and multilingual assessments (for various purposes) should be developed that allow learners to communicate what they know in more than one language. Such assessments do not typically exist and may need to be developed and piloted.⁷⁸

Other assessment instruments that reading improvement initiatives are encouraged to explore are those that measure expressive language (including both oral and signed language), as well as semantic fluency.⁷⁹ These assessments can help identify children's expressive language proficiency levels, which will in turn inform instructional design. Such assessments have recently been used in language mapping activities to identify what languages may need to be used for instruction in multilingual communities.



Stop and reflect: Instruction and assessment

Activity 5: This activity provides an opportunity for individuals and/or program teams to reflect on the approach to instruction and assessment used in the reading program in their country. Read the questions below and record your answers in the space provided.

1. With respect to the challenges you listed during the pre-reading activity, how can you apply what you learned in this section to address them? List at least two ideas.

2. What opportunities exist in your context or program to improve upon current approaches to *instruction*?

3. What opportunities exist in your context or program to improve upon current approaches to *assessment*?

⁷⁸ For a discussion on the need for and purpose of bi- and multilingual assessments, see Kathleen Heugh et al., "Multilingualism(s) and system-wide assessment: A southern perspective," *Language and Education*, 31, no. 3 (2017): 197-216. For more information about a multilingual literacy assessment being developed to support USAID reading programs, consult Margaret Dubeck, "Multi-Language Assessment (MLA) for Young Children: An Instrument in Development by RTI International" (blog), March 10, 2019.

⁷⁹ USAID is developing an expressive language assessment. A semantic fluency assessment instrument piloted in Ghana under the USAID EdData II initiative can be found in: RTI International, *Development and Pilot Testing of Additional Subtasks for the Early Grade Reading Assessment: EGRA 2.0* (Research Triangle Park, NC: RTI International, 2016b).

3.3 Resources for Teaching and Learning

Before you begin: Pre-reading reflections

Before you read this section on Resources for Teaching and Learning, reflect on the following:

- What challenges has your program encountered with respect to developing teaching and learning materials in multiple languages? What successes have you achieved?
- How has your program developed local capacity to support materials development and use beyond the life of the program? What gaps exist?
- What questions do you have about developing high-quality, language-specific teaching and learning materials? Write them down so you can refer to them later.

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Children and their teachers need high-quality, contextually appropriate and sufficient teaching and learning resources to learn the target languages, either as a first or additional language. They also need language-appropriate textbooks and other materials to both support language learning and to learn content across the curriculum.

Essential resources to support effective reading instruction and learning, regardless of the language, include a curriculum, teacher's guides and at least one primer for each student, so learners can individually have their "eyes on text" during the reading period.⁸⁰ Supplementary materials, like decodable and leveled readers, are also beneficial, as is a "print-rich" classroom environment that includes text on the walls in the form of alphabet charts, word cards, etc.

USAID and its partners, including the Global Book Alliance (GBA), play an important role in supporting the development of materials in various languages for teaching reading and, potentially, other subjects.⁸¹

Key ideas:

Resources for teaching and learning

- ✓ An inventory and analysis of currently available teaching and learning materials across languages is useful to identify what existing resources can be adapted and what needs to be modified
- ✓ A comprehensive work plan for resource production, based on findings from the situational analysis and materials inventory, should be developed and shared with all stakeholders
- ✓ A diverse resource development team should be formed to contribute to the development of TLMs; invest time and resources to build their skills and knowledge to support sustainability
- ✓ Many resources are available to support the efficient production of quality TLMs in multiple languages, including digital libraries, language analysis software, and lesson plan templates; review what is available before getting started
- ✓ All stakeholders need to understand issues related to resource copyright and licensing; obtain consensus about these issues *before* materials are developed and, whenever possible, openly license materials
- ✓ Be aware of and plan for effective resource distribution
- ✓ Concerns related to the cost of TLMs in multiple languages often surface; become knowledgeable about these issues and plan accordingly to support long-term sustainability of resource provision

⁸⁰ Amy Pallangyo, Alison Pflapsen, and Aristarick Lyimo, "Resources for Teaching and Learning Early Grade Reading" (webinar presentation), in *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success Training Series*, Global Reading Network, July 10, 2019.

⁸¹ While most USAID-supported reading programs develop materials for teaching reading only, due to the curricular approach in some countries, materials developed to teach reading may include instruction in subjects as well. Such was the case in Uganda under the School

Given the vital importance of resources to support reading acquisition, language learning, and learning across the curriculum, **Section 3.3** focuses on language-specific considerations related to materials development. Successfully and efficiently developing quality teaching and learning materials requires meticulous planning, particularly when materials will be developed in multiple languages simultaneously. While developing materials in languages that have not been previously used, developing materials in multiple language concurrently, or developing materials in the same language for multiple grades may seem daunting, many USAID-supported reading programs have successfully done so. Their experiences are described in the examples from practice and are reflected in the guidance provided in this section.

Tools and resources to support materials production are also referenced in this section, as well as listed in **Annex C**. For guidance and information on reading materials development and use more broadly, consult *Resources for teaching and learning early grade reading*, a professional development webinar short-course and resource package developed by and for the Global Reading Network.⁸²

3.3.1 Inventory and assess quality of existing materials

The first step in the materials development process is to conduct an inventory of existing resources available in different languages, as well as in Braille (a tactile representation of spoken languages). Taking the time to review what is already available can save time and money later, as well as provide opportunities for existing locally developed resources to find a wider audience.

The review should include materials in languages that are currently used, or may be used, for instruction in the relevant grades and subjects (e.g., reading, language, other content areas).

Sources of existing materials include:

- Other education programs (past or current);
- Local bookstores and markets; they may have materials that can be adapted, such as short stories that can be used for teacher read alouds or leveled text for students;
- Local publishing companies, which may have materials in target languages that could be used or adapted; and
- Education ministry staff, donors and implementing organizations in the country that can also help to identify resources.

When conducting an inventory of existing materials, be sure to check out the many multilingual digital libraries for openly licensed materials that can be used or adapted to a given language or context. Digital libraries to peruse include the Global Digital Library (which houses materials produced for USAID programs), the Bloom library, and the Let's Read! library (supported by the Asia Foundation). See **Annex C** for more information about these sources and links to them.

Health and Reading Program (SHRP) and the Literacy Achievement and Retention Activity (LARA). Materials can be found at: <http://shared.rti.org>

⁸² Amy Pallangyo, Alison Pflapsen, and Aristarick Lyimo, "Resources for Teaching and Learning Early Grade Reading" (webinar presentation), in *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success Training Series*, Global Reading Network, July 10, 2019.

In addition to conducting an inventory of existing materials, a materials development team (see **Section 3.3.3** below for more information) should review the quality and appropriateness of existing materials with respect to how they will be used and who will be using them. This includes analyzing:

- Whether the resources are language- or dialect-specific (e.g., have not just been translated from one language to another);
- Whether the resources are appropriate for young children;
- Whether the resources are appropriate for the culture and context;
- Use of standardized orthography and appropriate dialect; and
- Quality of the writing (e.g., grammar, clarity, etc.)



A review of existing materials was conducted to inform the development of TLMs to support reading instruction in Hausa (see Example from practice 11). Credit: Nigeria RARA (USAID), RTI International

When materials are applied in a new setting without review for adaptation, or are fully new development, resources will be more difficult for teachers to use effectively and less engaging for students while learning. It is important that resources be both language and context specific.

To support the review process, develop a tool that describes what should be reviewed and how. Train the materials review team how to use the tool and practice using it to verify that the information recorded is accurate. It's recommended that team members review materials together, such as during an all-day working session, so that issues that arise can be discussed and agreement reached as a team. **Example from practice 11** describes a process and tools used in Nigeria to conduct an inventory of existing materials and review their quality.

3.3.2 Develop a plan for resource production

Good planning is critical to the successful development of these materials, particularly when they are being developed across multiple languages and grades. Such

Example from practice 11:

Reviewing existing materials: An example from Nigeria

In preparation for an early grade reading pilot for Hausa in Northern Nigeria, the USAID-supported Reading and Access Research Activity (RARA) inventoried and analyzed existing reading materials. The purpose of the exercise was to identify what materials could be adapted and what needed to be developed. Materials were reviewed by a language expert, a reading expert and a teacher. Reviewers analyzed content, language, activities and design (readability) and recorded information in an evaluation rubric developed for the purpose. Read more about the process and see the evaluation tool used in the report cited below.

Source: RTI International, *Nigeria Reading and Access Research Activity: Review of Existing Reading Materials to Support Hausa Literacy Instruction* (Research Triangle Park, NC: RTI, 2014a).

planning includes allocating enough time for materials to be developed (and not translated from one language to another), to be field tested prior to use, and to be modified based on rigorous pilot testing and evaluation before being used on a wide scale (e.g., nationally). Factors to consider when developing a plan for resource production include the number of languages, grades and subjects for which materials will be developed; whether materials can be adapted from existing ones; what materials (or portions of materials) need to be translated; time required for official government approval of materials; and time needed for printing and distribution in all languages. Finally, the issue of cost is one that needs to be fully explored, discussed and planned for with respect to materials development, keeping in mind that the cost of developing instructional materials in new and multiple languages is not a recurring cost.

Table 5. Issues to consider when developing a plan and budget for materials lists factors to account for when developing a plan for materials development that fully considers language issues. Program teams, and a specially designed materials development team, should carefully consider these issues to develop a feasible and realistic plan for materials development.

Table 5. Issues to consider when developing a plan and budget for materials development

A plan for materials development should consider and account for the following:
<ul style="list-style-type: none"> ✓ Number of languages for which resources will need to be developed ✓ Inventory and review of existing materials (time and resources needed) ✓ Language analysis (time required, resources needed, technology available, etc.) ✓ Development/modification of curriculum or scope and sequence (time and resources needed) ✓ Resource specifications (includes amount and type of content needed, graphics and photos required, etc.) ✓ Development of content for each language and for each resource (e.g., conducting focus groups and outreach to develop story ideas; drafting and editing content; etc.) ✓ Field testing of materials (see Section 3.3.4 for more details on this important step) ✓ Procurement and printing in each language ✓ Capacity development required (e.g., training of materials development team in use of language analysis software, development of scope and sequence, story writing, lesson plan development, editing, etc.) ✓ Human resources available (e.g., amount of time relevant people have available to dedicate to the materials development process; do not assume government personnel will be available full-time) ✓ Time needed to secure government approval of (openly licensed) resources ✓ Funds available and cost of materials, including both one-time costs (such as developing a curriculum for a specific language) and recurrent costs (e.g., replenishment of materials on a regular, consistent basis); more discussion on this topic can be found in Section 3.3.6.

The plan for resource production should include who is responsible for the different tasks (described in the steps below). It should also be realistic. Experience across many reading programs indicates that the amount of time initially designated for materials development has been woefully insufficient. Although each language used for reading instruction will require its own team to develop resources, efficiencies can be achieved through the development of

common templates and other strategies. A list of resources to support materials development can be found in **Annex C**. A “process map” to guide materials development in **Annex G**, *Materials development process flow* provides a helpful roadmap to support the planning and implementation process.

3.3.3 Engage and build the capacity of materials development team

To support the development of teaching and learning materials that are specific to the language, culture and context, engage a diverse team of people to develop them. The team should be appropriate to the context and needs in terms of technical skills, language, ethnicity, religions, age and role. Reading specialists and language experts will need to work together to develop technically sound materials. Experts who can help to develop language-specific materials appropriate for children with disabilities, such as reading materials in Braille and in large print, should also be recruited. Local publishers and organizations (such as language associations) also can be tapped to be a part of materials development.

Representatives from the government or other relevant institutions also should be included as appropriate, as their involvement can often help to engender support for reading instruction in multiple languages, build the capacity of government to manage the materials development process in the future, and facilitate the resource approval. Finally, teachers, children and community members should be engaged in the process as well, as they will be familiar with children’s interests as well as the local context.

The capacity of the government, technical experts, and other partners in the country to contribute to materials development should also be considered. In Ethiopia and Ghana, for example, capacity development was an integral part of the materials development process, which required time and resources to conduct, but which supported the country team’s ability to continue modifying and developing materials in the future. **Example from practice 12** shares the experience from Ethiopia, where more than 100 people were engaged in the development of materials in seven languages.

Material development teams should receive training on the types of materials that will be developed, software and other tools that will be used to develop them, processes that need to be followed, and expectations with respect to their roles and responsibilities. Training all members of a materials development team can help everyone to “get on the same page” while at the same time allowing people to share their knowledge and expertise with others



Materials developed using Bloom software are field tested in Indonesia as part of the Enabling Writers initiative (see Example from practice 12). Credit: Yayasan Sulinana Foundation.

Example from practice 12:

Technology to support resource development: Bloom and Enabling Writers

To meet the growing demand for high-quality reading materials in multilingual environments, All Children Reading: A Grand Challenge for Development (ACR-GCD)—a partnership of the U.S. Agency for International Development (USAID), World Vision, and the Australian Government Department of Foreign Affairs and Trade (DFAT)—launched the Enabling Writers competition to catalyze the creation of software to facilitate efficient, cost-effective development of teaching and learning materials in local languages. The result was Bloom software, which is being used in many countries to develop early grade reading materials. For example, the USAID-supported Reading within Reach (REACH) initiative helped organizations in six countries to use Bloom to develop local language books. This included training teams how to use the software and working with them to provide 3,000 decodable and leveled books in 15 languages.

To support this process, REACH developed several resources to help teams using Bloom, including a guide on language set-up in Bloom and field testing materials. To access these resources, learn more about Bloom and download the software, consult **Annex C**.

Source: Global Reading Network, Enabling Writers Workshop Program [web page]

3.3.4 Develop language-specific resources

This process of developing language-specific resources for the relevant grades and subjects is critically important to support learning, since without technically sound, appropriate and effective teaching and learning materials reading instruction will not be successful. Key language-related steps to take into account when drafting teaching and learning materials across languages are described below.

- **Verify a language's orthography has been standardized and approved.** As described in **Section 3.1.6**, a language must have a standardized orthography to be used for teaching and learning. Do not start developing materials until the language's orthography has been reviewed to verify it is appropriate for instruction and has been officially approved by the relevant institutions and government. (Note that sign language does not have an orthography; however, use of the local sign language should be approved by the relevant institutions and government.)
- **Develop a glossary of reading-related terminology in the target languages.** Many reading programs have found it beneficial to develop a list of terms and their definitions in the languages to be used for literacy instruction. The list can include terminology related to critical reading skills (e.g., phonemic awareness and reading comprehension), instruction and assessment (e.g., explicit instruction and formative assessment), types of teaching and learning materials (e.g., decodable books), and academic vocabulary relevant to the grades, subjects and content. The list can then be shared with those developing instructional materials to verify that everyone is using the same terminology, which should be incorporated into teacher professional development as well.

- **Develop informational texts.** Alongside narrative text, reading programs are encouraged to develop informational text that helps children to learn vocabulary and builds their conceptual knowledge. Such text is appropriate and useful to students learning to read in both their L1 and their L2.⁸³
- **Identify software and other technology to support materials development.** The process of developing teaching and learning materials can be greatly enhanced through the use of language analysis software. Before developing materials, become familiar with software that is available and how it could support your particular programming needs. Examples of software that has been used to support reading programming include Bloom, PrimerPro and SynPhony. These programs can analyze a given language (based on a corpus of text) to inform the development of an efficient scope and sequence, as well as help authors to develop controlled text (e.g., decodable and leveled readers). SIL also provides free, online resources to support materials development, including fonts, language analysis software and shell books. In Morocco, assistive technology has been used to help educators create education materials for students who are deaf or hard of hearing.⁸⁴

See **Annex C** for a list and description of software and other technology to support materials development. Read **Example from practice 13** to learn more about how Bloom software was used to support local language book production under the USAID-supported Enabling Writers initiative.



A girl in Ethiopia learns to read (see Example from practice 13). Credit: Ethiopia READ II (USAID), Creative Associates

⁸³ Christabel Pinto, “The Missing Genre: Creating Quality Non-fiction Books for the Early Grades” (presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, 2018).

⁸⁴ “Moroccan Sign Language Assistive Technology for Reading Improvement of Children Who are Deaf/Hard of Hearing,” *All Children Reading: A Grand Challenge for Development*, accessed 9 November 2019.

Example from practice 13:

Transforming language policy into practice by improving the book supply chain and local capacity:
The case of Ethiopia

Since the 1990s, education policy in Ethiopia has supported the use of mother tongue, or L1-based, instruction in schools. Officially, local governments can choose which languages to use for teaching and learning, and they are required to teach Amharic as a language of country-wide communication. Policy also requires pre-service preparation for kindergarten and primary level teachers to be provided in the national language used in the area.

However, in reality, regional education authorities did not have the resources or support to implement the policy. Most textbooks were translated from Amharic and not developed for specific languages, while some language communities did not have any materials in their language at all. Many linguistically heterogeneous areas selected only one local language for instruction, while others transitioned to English earlier than proscribed by the policy. Teacher training was also not provided in/for certain languages.

To turn language in education policy into effective practice, the USAID-supported Reading for Ethiopia's Achievement Developed Technical Assistance (READ TA; 2012-2017) collaborated with the Ministry of Education and Regional Education Bureaus to adapt the national syllabus and develop teacher's guides and student books for grades 1-8 in seven Ethiopian languages. Materials to teach English as an additional language were also developed. Working in collaboration with the government and language-specific author teams, READ TA also developed pre-service teacher training courses and materials for seven languages.

READ TA further Rather than select a handful of language experts to write the books, materials development teams were formed that included teachers, local story writers, and language specialists identified by the regional bureaus. More than 100 language specialists and educators received intensive training and ongoing support throughout the materials development process, which took approximately one year. Under the follow-on program, READ II, these materials are being revised based on outcomes and experiences from their initial use.

Other important actions undertaken under READ II to further build local capacity and improve access, development and distribution of text included the following:

- Conducted a study on best practices for cost-efficient book production and developed a "best practice" report on cost-efficient book production and distribution;
- Pilot tested tools and processes for tracking and tracing materials, which generated strong interest from the Ministry of Education and World Bank; and
- Conducted a needs assessment and developed a plan for building capacity for book chain development for the Ministry of Education and other stakeholders.

The program is also working with Ethiopian publishers and other stakeholders to increase the number of children's books validated by the Ministry of Education and available for purchase.

Sources: Creative Associates International, *READ II: Annual Report, October 2018-September 2019*. Washington, D.C. Creative Associates International, 2019; Wendi Ralaingita, *Language Policy, Planning and Practice in EGR Programs in Ethiopia & Nepal*, presentation delivered during the GRN webinar *Language Policy, Planning and Practice in EGR Programs*, March 7, 2018; Alison Pflepsen et al., *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes* (Research Triangle Park, NC: RTI International, 2016).

Example from practice 14:

Processes, tools and lessons learned from developing materials in 11 languages in Ghana

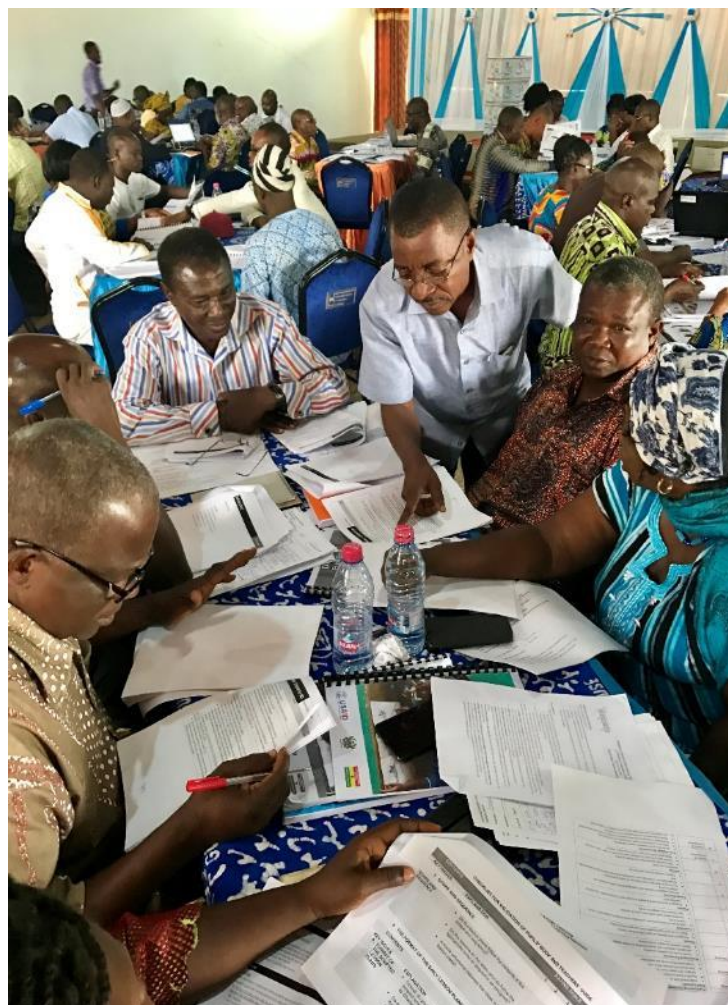
Developing materials in multiple languages may seem like a daunting task, but the experience of the Ghana *Learning* project shows it *is* feasible and achievable. Key to the Ghana initiative's success were: (1) the development and implementation of plans, tools and protocols to keep everyone “on the same page” and support quality control throughout the materials development processes; (2) collaboration among diverse organizations and individuals including the Ghanaian Ministry of Education, organizations with expertise in linguistics, writing for children, administration and logistics; and (3) adaptive management to address challenges and improve processes. Recommendations from the Ghana experience include the following:

- **Invest in prep work prior to developing materials.** Conduct language analysis, translate templates, and prepare process documents in advance.
- **Provide training to everyone involved.** Accompany training with written guidance on every aspect of the process.
- **Create accountability mechanisms to facilitate timely completion of materials.** Establish clear roles and responsibilities (including who to go to when challenges arise) and schedule for deliverables.
- **Use technology to support quality control.** For example, locked lesson plan templates and a protocol for e-file management were essential.
- **Conduct rigorous editing early and continuously.** A system of peer editing worked well.

Surveys of those involved in the processes allowed the project team to gather feedback and adjust the process along the way to improve efficiency. It also fostered trust among the team and motivated participation and improved quality.

Source: Felicia F. Boakye-Yiadom, Mackenzie Matthews, Emily Miksic, and Barbara Trudell, *Developing Early Grade Reading Materials in 11 Languages: Learning in Ghana*, presentation at the Comparative and International Education Society (CIES) annual conference, Mexico City, Mexico, 2018.

- **Develop templates, tools and processes to support materials development.** Prior to drafting materials, develop templates, tools and other resources to support the efficient production of quality resources. For example, language teams can collaborate to develop a common lesson plan structure and content for a teacher's guide that will be used across languages. If materials are being developed to teach subject matter (e.g., math or science), language specialists and subject specialists can work together to create similar materials in different languages. A list of tools and processes to support materials development can be found in **Annex C**. Other useful tools are included in **Annex H** and **I**, *Lesson plan templates examples* and **Annex J**, *Peer review checklist for materials*. **Example from practice 14** provides insights into how the Ghana *Learning* reading initiative successfully developed materials in 11 languages.



To support improved access to literacy, teaching and learning materials for 11 languages were developed in Ghana (see Example from practice 14).
Credit: Ghana Learning (USAID), FHI 360

- **Align content with the curriculum or scope and sequence for each language.** Teaching and learning materials should be fully aligned with an officially approved curriculum (or a scope and sequence for instruction, if a curriculum does not yet exist) for that language. Alignment is also needed across different types of materials, such as the teacher's guide and student books.
- **Monitor the quality of materials developed.** The quality of materials needs to be monitored *as they are developed*—not once they have been completed. Continuous monitoring is particularly important when materials are being developed in new and/or multiple languages and with a diverse team. Quality with respect to language (vocabulary, grammar, punctuation, etc.); content (e.g., alignment with curriculum, text difficulty, readability and complexity) and appropriateness (e.g., related to the context and age of learners) as well as inclusivity and equity (e.g., representations of various groups including girls and people with disabilities) are just some of the issues to monitor and review. Lesson plan templates (like the ones included in **Annexes H and I**) and the peer review checklist (**Annex J**) are useful tools to support quality monitoring.
- **Field test materials.** Materials should not be printed and distributed, even for piloting, unless at least some portion of the resources has been field tested. A field test is different from pilot testing in that field testing is designed to be relatively short (e.g., a few days may be sufficient in some cases, while more time may be necessary depending on how many materials need to be tested, and the information that is needed), and can also be conducted at various points during the materials development process as new and updated versions of materials are developed.

During field testing, a prototype (e.g., draft version) of the materials is tested and reviewed for appropriateness and usability with the target audience—e.g., teachers and students who use the language. Field testing should include actual use of the materials in a classroom setting and assess the following:

- Appropriateness of language and dialect used;
- Level of text difficulty;
- Student interest and engagement (field testing of multiple stories can help identify topics of particular interest and engagement for children; identify plots that may not be clear, etc.);
- Ability of teachers to effectively use resources (during a field test, this will include identifying whether the page size, binding, and formatting of the document is appropriate);
- Appropriateness within the specific context (issues to explore include appropriateness and accuracy of pictures and photos, and whether children understand visual representations);
- Inclusivity of materials (this includes whether the materials are inclusive of different socio-cultural groups, children with disabilities, etc.; consult **Annex C** for a list of resources with guidance on developing inclusive materials); and
- Readability and design elements (this will include the font type, font size, layout and overall design of the teaching and learning materials; consult **Annex C** for a list of resources on these topics).

Field testing should focus on the response to resources from all users, including both teachers and students. Teachers should provide feedback on the ease of use, appropriateness for students, and alignment with the curriculum or scope and sequence. Students should also provide feedback on the materials' accessibility and readability, their interest and engagement in the materials, and their preferences for themes and topics. This combined set of information will provide the materials development team with valuable information to refine and finalize materials before they are printed and

distributed. Consult **Annex C** for resources on how to conduct field testing, and for more information on the issues listed above.

If materials will be developed in many languages for the first time, consider staggering their development. This will allow the materials development team to trial processes and tools, refine them and apply lessons learned to a subsequent round of materials development for other languages. If materials are needed in all languages simultaneously, production can also be staggered in terms of what is developed. For example, after production of a grade 1 teacher's guide and student book, allow time for pilot testing before developing grade 2 materials. The production of additional materials can take place once essential materials have been developed and delivered.

3.3.5 Openly license materials and share online to increase access

Because of the great need to make educational resources more widely available—particularly in low-income contexts and in languages not traditionally used for learning—the global trend is to apply open licensing to teaching and learning materials, which allows them to be freely used and repurposed.⁸⁵ Openly licensed materials allow copyright to remain with the creator/owner of the content but facilitate reuse, adaptation, and distribution without first requesting permission from the copyright holder. Open licenses therefore can greatly support sustainable access to and proliferation of materials in many languages, since materials can be more freely accessed, printed, adapted and distributed. Most educational resources developed through USAID-funded reading programs must be licensed through the Creative Commons Attribution 4.0 International License (CC BY 4.0).

Donors, implementing partners, governments and others involved in developing reading and other education materials in various languages should become knowledgeable about the types of open licenses, the potential benefits of using open licenses, and other issues related to copyright and open licenses. For more information about open licensing, consult the GRN resource *Open Licensing of Primary Grade Reading Materials: Considerations and Recommendations*,⁸⁶ as well as several webinars on this topic geared toward publishers and USAID implementing partners; see **Annex C** for a complete list of available resources.

Agreement on how materials will be openly licensed and who will hold the copyright needs to be obtained well in advance of materials being developed. More information about this topic, including how open licensing affects publishers and USAID reading program experiences working with government on open licensing can be found in several resources included in **Annex C**.

Once materials are developed, they should be made publicly available online. For initiatives supported by the U.S. Government, materials are usually required to be posted on the Development Exchange Clearinghouse (DEC). In addition, materials can be submitted to a digital library. These include the Global Digital Library (GDL), which collects existing high-quality, open educational reading resources and makes them available via the web, on mobile devices and for print. Other global digital libraries include StoryWeaver, Bloom library, and Let's Read! More information and links to digital libraries can be found in **Annex C**.

⁸⁵ For more information on open educational resources (OER), consult the William and Flora Hewlett Foundation's website on this topic at <https://hewlett.org/strategy/open-educational-resources/>.

⁸⁶ Sofia Cozzolino and Cable Green, *Open Licensing of Primary Grade Reading Materials: Considerations and Recommendations*, resource developed by REACH and the GRN (Chevy Chase, MD: URC, 2019).

3.3.6 Consider cost and supply chain issues to support expansion and sustainability

Cost is an issue that tends to surface early and often in discussions about language and instruction. Indeed, the “high cost” of producing materials in multiple languages is often cited as a reason that reading and content-specific instruction in children’s L1 or other familiar languages is not feasible. However, as described in detail in **Annex A**, experience and research on this topic has found that the cost of providing instruction to children in a language they understand is more cost-effective than providing instruction in a language they do not understand.⁸⁷ This is due to the tremendous amount of waste, inefficiencies and inequities associated with instruction in languages children do not use and understand well in terms of inequitable access to schooling, poor learning outcomes, repetition and drop out. Providing teachers and their students with high-quality materials that support reading and language acquisition—and access to subject content—in a language they understand is thus critical to improving efficiencies in the education system.

As USAID-supported reading programs have grown and expanded, they are currently better tracking both the one-time costs (such as developing a new curriculum for a specific language) and recurrent costs (such as replenishment of materials on a regular basis). (See resources and guidance on cost reporting for USAID-funded education activities listed in **Annex C**.)

Anecdotal feedback from USAID programs to date indicates that the cost of *developing* reading materials in multiple languages is not astronomical, and programs are finding that costs decrease as more tools and efficient practices are applied, such as using lesson plan templates across languages to improve the pace and quality of the lesson plans developed. (And as more programs follow guidance and lessons learned, materials also need to be revised fewer times and less extensively.) Moreover, the materials development is a one-time cost, with needs for periodic updates.

Printing costs for materials in multiple languages has also not proved to be significantly higher than the status quo (and sometimes, it has been found to be cheaper), given improvements in the materials procurement process. Rather, additional costs have come from increasing the amount of reading materials provided to schools, which in many countries did not have any reading materials at all. While context-specific budgeting is necessary, the use of experienced international printers and/or the increased capacity of local printers is likely to decrease costs over time, while increased cost savings due to improved learning outcomes will also make printing materials in multiple languages a cost-effective investment.

Importantly, some programs have noted that a major cost associated with providing teaching and learning materials is not the cost of materials development or printing, but the cost of *distribution*. This is irrespective of the number of languages used for reading instruction. Efforts to improve the book supply chain—e.g., tracking and tracing where books are in the system to verify they are getting to their intended destination—are currently being trialed in many countries, with USAID support.⁸⁸ As in-country technical capacity improves and experience and knowledge are gained

⁸⁷ Harry Anthony Patrinos and Eduardo Velez, “Costs and Benefits of Bilingual Education in Guatemala: A Partial Analysis,” *International Journal of Educational Development* 29, no.6 (2009): 594–598; World Bank, “In Their Own Language...Education for All,” *Education Notes*, 2005.

⁸⁸ For more information on track-and-trace, consult “Track and trace models facilitating book distribution and more access” (GRN-organized panel presentation, annual conference of the Comparative and International Education Society (CIES), April 2019. San Francisco, CA, 2019).

across all aspects of the materials supply chain—from development to delivery to storage and maintenance—costs are likely to decrease further.

Alongside cost, the sustainable provision of high-quality materials in multiple languages requires a functioning book supply chain. To maintain appropriate levels of access to reading materials, programs are encouraged to identify and support the local systems that are required to ensure the development and provision of these resources. Consult **Annex C** for additional resources on book supply chain issues, including the USAID-supported Global Book Alliance (GBA), which identifies, develops and shares information on this important topic.

Programs must also consider the local systems that support sustainable provision of TLMs, and should identify the support needed to ensure provision continues when a program ends.



Stop and reflect: Resources for teaching and learning

Activity 6: Reflecting on a program you currently or previously supported, read the list of steps in column 1, which are described in this section. In column 2, indicate whether the step was undertaken and to what extent. List any components of the step that were not undertaken. If the step has not been conducted, in the third column describe the benefit of doing so and how to go about it.

Steps	Did the reading program conduct this step? What gaps may exist?	Why and how to undertake this step now?
Inventory and assess quality of existing materials	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	
Develop a plan for resource production	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	
Engage and build the capacity of materials development team	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	
Develop language-specific resources	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	
Openly license materials and share online to increase access	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	
Consider cost and supply chain issues to support expansion and sustainability	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Partially (indicate what could be done better):	

Activity 7: Review the list of resources and tools described in this section and in **Annex C**. What resources and tools would be useful to you and your program? List them here.

1. _____
2. _____
3. _____
4. _____
5. _____

3.4 Teachers and Teaching

Before you begin: Pre-reading reflections

Before you read this section on Teachers and Teaching, reflect on the following:

- How have teachers' knowledge and skills related to language been assessed in the context(s) where you work? What gaps exist with respect to understanding and addressing their needs?
- What challenges have you encountered providing teacher professional development related to language issues?
- What questions do you have about how to integrate language issues into teacher professional development? Write them down so you can refer to them later.

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Teachers are at the heart of education. They must have the knowledge, skills and support to be able to do their job effectively. Efforts to improve reading and language instruction, and the instruction of content in languages children know best, must, therefore, specifically consider teachers' language proficiency, their teaching skills in that language, their attitudes and beliefs about language instruction and ethnolinguistic groups, and their needs for professional development and other support in order to effectively teach language and reading.

This section thus describes specific language-related issues to consider and steps to take to support teachers in providing effective reading and language instruction. Additional resources on teachers and teaching can be found in **Annex C**. More information on teacher professional development generally, including coaching, can be found in the Global Reading Network webinar short-course and resource package Continuous professional development in reading programs.⁸⁹

⁸⁹ Amy Pallangyo and Alison Pflapsen, "Continuous Professional Development in Early Grade Reading Programs" (webinar), in *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success Training Series* (Global Reading Network, July 24, 2018).

3.4.1 Assess teacher

language proficiency,
knowledge, skills and
beliefs

An assessment of the following is important to inform the design and ongoing implementation of various aspects of reading programming and language use in education more broadly:

- **Teacher language proficiency:** Teachers need to be proficient in the language(s) of instruction to be able to effectively teach. Proficiency includes an ability to speak, use, read and write the language sufficiently well to teach it and to teach in it. This includes proficiency in sign language for teachers who will be teaching children who are deaf and hard of hearing.
- **Teacher knowledge, skills and practices:** Teachers need to be knowledgeable about the curriculum and be able to apply evidence-based instructional practices for reading instruction in specific languages. They also must have the knowledge and skills to teach literacy appropriately when children are learning to read a language that is their second language (an approach which should be reflected in the curriculum and teacher guides, but one that teachers will need to be well-trained to implement).
- **Teacher attitudes and beliefs:** Teacher attitudes and beliefs about languages and users of them, how children best learn language and subject matter; and how language should (or should not) be used in classrooms can all affect the quality of their teaching.

Key ideas:

Teachers and teaching

- ✓ Teachers and students need to be able to effectively communicate with each other for effective teaching and learning to take place; students who are deaf or hard of hearing need teachers who can provide effective dual-language instruction in sign language.
- ✓ Teachers' language-related knowledge, skills and beliefs are important to assess and understand.
- ✓ Teacher professional development (both pre- and in-service) needs to align with the reading approach and should include language-specific knowledge and skills teachers need to have, including sign language if needed.
- ✓ Teachers must be able to effectively apply instructional approaches that are relevant to the language.
- ✓ Teachers may need opportunities to improve their language and literacy skills, even if a language is their L1.
- ✓ Teacher school assignment policies and practices need to support effective learning by taking teacher-student "language match" into account; this includes assigning teachers who are proficient in sign language to meet the needs of students who are deaf and hard of hearing.



Teachers' language proficiency and their knowledge, attitudes and beliefs about language issues need to be assessed and addressed.
Credit: Rwanda L3 (USAID), Education Development Center

Understanding the issues described above in a given context is critical to:

- developing instructional approaches and materials that teachers can effectively use;
- providing teachers with professional development that meets their needs;
- placing teachers in schools where they are able to effectively communicate with students; and
- raising awareness among teachers about language issues to get them “on board” with a new approach to reading instruction.

To inform implementation of the government of Rwanda's Education Sector Strategic Plan (2010-2015), DfID and USAID collaborated on an assessment of teachers' English language proficiency. A survey of nearly 600 teachers found that most exhibited only “beginner” or “elementary” level skills in reading, writing, listening and speaking.⁹⁰ Such low skill levels pose significant challenges for effective instruction of English as a subject, as well as its use as a language of instruction in the country.

Even programs that have been implemented for several years can benefit from assessing teachers' language skills, knowledge and practices, as this information can inform program results to date, identify modifications that may need to be made to teaching materials or teacher professional development, help identify new policies and practices that may need to be developed, and provide insights that will inform program expansion and sustainability. Consult

⁹⁰ Health and Education Advice and Resource Team (HEART), *Independent Verification of Educational Data for a Pilot of Results-Based Aid (RBA) in Rwanda*, 2013.

Example from practice 15 and **Annex E** to learn about four countries' experiences assessing teacher knowledge, skills and language proficiency in the context of reading programs.

Strategies for gathering information on teacher language proficiency, knowledge and skills, and attitudes and beliefs include: classroom observations, self-reported questionnaire responses (written or oral) asking teachers about their language skills and education, and formal language and literacy assessments (conducted as part of teacher training, as part of a language mapping survey, or as part of baseline data collection).

Gathering information about teacher knowledge, skills, practices, attitudes and beliefs should be conducted in a respectful, appropriate manner. This includes articulating the specific purpose of the information gathering exercise and communicating it to teachers; identifying what specific information needs to be collected; developing appropriate instruments to gather the relevant information; and collaborating with relevant stakeholders throughout the design and implementation of data collection to verify the approach and content is appropriate (this includes field testing any instruments and data collection methodologies to be used).

It's important that information gathered about teachers' knowledge, skills, attitudes and beliefs be used appropriately—namely, to inform program design and to provide ongoing professional development and classroom-based support. Survey information should be anonymized, and findings should not be used to penalize, sanction or fire teachers.

Example from practice 15:

Understanding teacher knowledge, skills, practices and beliefs to inform reading program design and delivery

Surveys of teacher knowledge, attitudes and practices are increasingly common in reading programs. The results are being used to inform the design of teaching materials, instructional approaches, teacher professional development, advocacy with teachers on language issues and discussions related to teacher school placement. **Annex E: Understanding teachers' knowledge, skills and practices related to reading** summarizes four reading programs' efforts to gather information about teachers' language and literacy proficiency and their instructional practices. Links to full reports and instruments are included in the annex.

3.4.2 Incorporate language issues into teacher professional development

Efforts to improve reading and education outcomes more broadly need to provide opportunities for teachers to learn about language-specific issues, both during pre-service preparation and in-service professional development, including workshops and pedagogical coaching. **Table 6** summarizes key language-related knowledge and skills that should be included in teacher preparation and supported through continuous professional development.

Pre-service and in-service professional development should be aligned to each other. For example, as part of the USAID-supported Reading for Ethiopia's Achievement Developed (READ) Technical Assistance (TA) Project, pre-service preparation was revised to align with new curricula for teaching in seven L1 languages in grades 1-8. Professional development should also be provided in the languages that teachers will be expected to teach *in* so they gain the pedagogical vocabulary and literacy levels needed. Ethiopia, for example, mandates that teacher training be provided in the national language used for the area.

It's important to note that even when teachers speak and use the language identified for reading instruction (or instruction more generally) they may not necessarily be able to teach children to read it, having not been trained

in reading pedagogy, or pedagogy specific to that language. They may also not be able to read and write as fluently as required to teach effectively. Moreover, they may be resistant to teaching the language (if they feel it is a less “prestigious” language than others), as well as to improving their own literacy skills in that language (see **Section 3.4.5** below for more on this topic). Reading programs need to be aware of these potential challenges and find effective ways of addressing them in order for professional development to be successful.

Table 6. Language-related knowledge and skills teachers need to be effective

-
- ✓ A high level of proficiency in the language(s) they are expected to teach and teach in (able to speak/use language, read and write it); this includes proficiency in sign language for teachers who are responsible for teaching children who are deaf or hard of hearing
 - ✓ Ability to communicate well with students in a language they both understand
 - ✓ Knowledge of the orthography, sound structure and spelling patterns of the language in which they are teaching reading
 - ✓ Knowledge of and ability to apply evidence-based, appropriate instructional strategies for teaching children to read in a first or familiar language and/or a second or additional language, depending on the curriculum
 - ✓ Ability to use language-specific teaching and learning resources effectively
 - ✓ Pedagogical vocabulary to teach academic content in specific languages
 - ✓ Knowledge of and ability to apply effective strategies for teaching a second or other language, and for transferring language and reading skills from one language to another, if required
 - ✓ Attitudes and beliefs that support effective reading and language instruction
 - ✓ Respect for the language (and language users) they are teaching
-

3.4.3 Provide teachers with resources in the appropriate languages

Teachers need teaching and learning materials in the languages they will be expected to teach reading. They also need materials for teaching language. Such materials support effective instruction by providing teachers with guidance on the content of instruction, effective teaching strategies and methods for assessment. Materials should be in the target languages to help build teachers’ language skills. They also need to be provided before or during teacher training so teachers can learn about and understand how to use them, as well as have an opportunity to practice using them, in a structured learning environment.

As described previously, reading and other education programs should develop the required TLMs in the target languages and not rely on teachers to translate them. They also must provide teachers with explicit instruction on the content of the materials and how to use them—such training should *not* be provided if the materials are not available. Programs should also survey teachers to verify that they are receiving teaching and learning materials in the languages they and their students need.

3.4.4 Provide professional development opportunities for administrators, teacher educators and other key stakeholders and clarify roles for reform

For many teacher educators and education administrators, the evidence-based approaches to teaching reading and to teaching language that USAID supports represent a significant change from what has long been done. The benefits of teaching children to read in their L1 may be new to them, and they may not have the knowledge and skills they need to effectively carry out their role. Teachers and administrators may also not be familiar with evidence-based practices for bilingual instruction of children who are deaf or hard of hearing.

Administrators (at the national, sub-national and school levels) and teacher pre- and in-service educators will require professional development in the topics listed in **Table 6**. It's important to first assess administrators' and teacher educators' existing knowledge, skills and practices with respect to teacher preparation and support. Training can then be appropriately tailored to meet their needs. **Example from practice 16** describes an effort in Nigeria to design and deliver professional development to teacher educators, researchers and other key stakeholders to enable them to support reading improvement efforts long-term. The graduate-level course, designed by instructors from Florida State University, explored language issues including how children acquire first- and second-language skills, as well as specific skills they need to have in the languages they are learning (Hausa and English).

3.4.5 Provide opportunities for teachers to strengthen their language and literacy skills

In addition to providing professional development related to reading pedagogy and language-specific issues, reading programs commonly find that teachers need opportunities to improve their own language and literacy skills to effectively teach reading. It's important to remember that

even if teachers speak and use a language, they may not necessarily be able to read and write it well. This is true even for L1 speakers of a language, who may not have learned to read and write it.



Nigerian teacher educators, researchers and others display the certificates they earned after completing a graduate-level course in early grade reading developed through the NEI Plus initiative. Credit: Nigeria NEI Plus (USAID), Creative Associates International.

Example from practice 16:

Providing professional development for teacher educators and others through graduate-level coursework in Nigeria

Recognizing the acute need to create a cadre of local experts capable of supporting reading improvement efforts long-term, the Nigeria Northern Education Initiative Plus (NEI+) initiative, funded by USAID, developed and delivered a graduate certificate course for teacher educators, researchers and national stakeholders to build their expertise in the design, delivery, monitoring and assessment of reading programming. The course built on foundational knowledge and skills these stakeholders had acquired through their participation in NEI Plus activities, including materials development and teacher training. Course topics include primary grade reading skills and instructional strategies; first and second language acquisition; reading assessment; conducting community outreach on reading; and conducting independent research. Upon completion of the course requirements, participants receive a certificate and letter of course completion from Florida State University.

Source: Florida State University and Creative Associates, *Literacy Skills in the Primary School: A Graduate Certificate Course for Teacher Educators, Researchers and National Stakeholders*. Available in “Continuous Professional Development in EGR Programs” (GRN webinar); see Handout 5.

Reading improvement initiatives should use teacher language assessment information to identify what language skills teachers need to improve and should work with them to identify strategies for doing so.

This includes developing opportunities for teachers to improve their proficiency in sign language, if needed. Programs are encouraged to trial and evaluate strategies that may help to boost teachers’ language and literacy skills. These may include providing teachers with engaging, age-appropriate reading material in target languages to practice their reading skills; encouraging peer “literacy and learning circles”; supporting vocabulary development, especially of technical terminology, through the

provision of dictionaries, glossaries, and through explicit instruction during teacher training; and literacy instruction designed for adults or specifically for teachers. Whatever approaches are used should be monitored and evaluated to determine whether they are effective.

Teachers may be resistant to learning how to read and write in a language they already speak and use and may need help understanding how their existing language and literacy skills transfer to another language. This can even be true for teachers who are literate in an L2 or ex-colonial language but have not learned to read and write in their L1. To support their own language learning and implementation of an L1-approach to reading instruction, teachers also may need support to understand the value of language proficiency in the LOI, when the social value associated with home or local languages may be low. Comprehensive professional development that supports teachers’ acquisition of new knowledge and skills across many areas can provide them with a sense of common purpose, an understanding of the rationale for change, and confidence and motivation to implement an L1-based approach to instruction in their classroom.

3.4.6 Review and improve teacher school placement policies and practices

As noted previously, teachers cannot effectively provide instruction if they are not proficient in the same language as their students, and if they do not have the skills necessary for teaching a language as a subject and/or teaching subject matter in a specific language. USAID and its partners play an important role in assisting the education sector to review and, if needed, improve teacher placement (deployment) policies and practices, as they relate to language, to support

effective teaching and learning. Such efforts are supported by UNESCO, which has also advocated for increased consideration of language issues when recruiting and assigning teachers to schools (see **Textbox 4**).

A review of language mapping data that includes information of teachers' and students' language proficiency can identify geographic areas and specific schools where teachers are not sufficiently proficient in the required language used for reading instruction (or instruction generally). Such data can be a powerful tool to advocate for modifications to policy and practice and can help stakeholders to develop solutions that will best support improved instruction. For example, a language mapping exercise in Ghana conducted as part of the USAID-supported early grade reading program in the country identified the degree of teacher-student language "match" in schools in a large geographic area, with the aim of helping policy makers and educators identify how to improve instruction at the school level. The study also aimed to spur discussion on strategies that can be used to support teachers and students when a "language mismatch" cannot be immediately remedied.⁹¹

Teacher assessment and teacher placement are likely to be sensitive issues, with specific political, historical and social implications. Teachers may be fearful of taking a language proficiency assessment if they think it will result in losing their job. Therefore, efforts to assess teacher language and literacy skills need to carefully consider the approach that will be used, need to take precautions to ensure that results will not be used in a punitive manner, and need to clearly communicate with teachers the purpose of the assessment. Then, discussions related to teacher placement and potential modifications to policy or practice should involve teachers. New policies or practices should not unfairly restrict teachers—particularly those who use minority languages—to certain areas or limit their opportunities for professional growth.

For language groups that are underrepresented in the teaching workforce, efforts should be made to improve access to teacher training programs for users of these languages. To fill immediate needs in schools where learners are not being taught by teachers who share their language, temporary measures to consider include recruiting community-based teacher assistants, developing fast-track or alternative certification routes, distance learning programs, and using translators in the classroom. These efforts should be trialed and assessed to identify whether they are effective.

Lastly, reading programs and education systems might consider piloting alternative approaches to the traditional "one teacher, one school" model. This includes exploring options such as partner teaching to allow teachers who are not proficient speakers of a language to be supported by a teacher who is. Another model to consider is to allow teachers proficient in languages taught as L2/foreign languages (e.g., English, French, Portuguese in the sub-Saharan African context) to become specialized in language instruction. These teachers could then teach across multiple grades and possibly even in neighboring schools. This approach may be more cost-effective and feasible than expecting all teachers to teach in an unfamiliar language. Indeed, it is a common approach to teaching second and foreign languages

Textbox 5. Language and teacher recruitment and placement

The *2013/14 Education for All Global Monitoring Report* advocated for improved teacher recruitment and placement strategies to address inequities, including shortages of teachers who use various L1 languages, and the real and perceived deprivations of teaching in rural areas where minority languages tend to predominate. Among the strategies are locally based recruitment, various types of monetary and housing incentives, and establishment of clear career paths.

Source: UNESCO, "A four-part strategy for providing the best teachers," in *2013/14 Education for All Global Monitoring*

⁹¹ FHI 360, *Ghana Learning Language Mapping Study: Analysis Report* (Washington, D.C.: FHI 360, 2018).

in middle- and high-income countries, and one that is overdue for consideration in low-income countries where the demand and need for instruction in foreign languages is even more acute at the primary level. However, any effort to change the approach to language of instruction is a long-term process, complex in nature, and takes time to refine and institutionalize.



Stop and reflect: Teachers and teaching

Activity 7: Reflecting on your work supporting reading improvement, answer the questions below based on the information presented in **Section 3.4**.

How have teachers' professional development needs *specific to language* been (1) assessed and (2) addressed in your reading work? If they have not been, or if room for improvement remains, describe specific ways that teachers' language-related professional development needs can be addressed.

1. A) How have teachers' PD needs specific to language been assessed?

B) What additional information needs to be collected about their PD needs? Areas of interest include teachers' language proficiency, knowledge and skills related to teaching reading in specific languages, and specific approaches for teaching children to read as a first or additional language.

2. A) How have teachers' PD needs specific to language been addressed, through professional development or other means?

B) How can existing teacher PD be improved to address teachers' needs?

3. Based on what you read in this section, how can you or your program address the challenges and gaps you cited in the pre-reading activity?

3.5 Communication, Advocacy and Support

Before you begin: Pre-reading reflections

As you read this section about communication, advocacy and support for language of instruction issues, keep the following guiding questions in mind:

- How can communication about a reading program and an approach to using language for instruction enhance the stakeholders' understanding and support for it?
- How are parents and caregivers currently engaged in supporting children's reading and language acquisition in your context? What gaps still exist?
- What opportunities exist for improving stakeholder engagement—especially engagement of parents and community members—in reading programs?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Literacy improvement initiatives require the buy-in and ongoing support of diverse stakeholders to be successful. Donors, governments and their partners need to engage in efforts to communicate and advocate for evidence-based approaches to instruction, particularly if they involve changing the status quo to provide instruction in languages children speak, use and understand.

This section summarizes strategies for communicating information about evidence and best practices related to language. It also discusses the need to build the political will among diverse stakeholders—from parents to teachers to education officials—to enact the changes necessary that will lead to improved literacy and learning outcomes for all children.

3.5.1. Develop and implement a communications and advocacy strategy

To gain support for decisions and actions related to language use in reading and the education sector generally, a multi-tiered communications and advocacy strategy targeting diverse education stakeholders is required. Stakeholders to target include:

- Parents, caregivers and the larger school community;
- Teachers and principals;

Key ideas:

Communications, advocacy and support

- ✓ A communications and advocacy strategy targeted to specific groups is essential to communicating the importance of effective language use to support early grade reading and learning improvement.
- ✓ Parents and caregivers play an important role in supporting children's reading and language issues; their ability to do so requires providing them with information on how to specifically do so.
- ✓ Building the capacity of government and local institutions across key components—curriculum, materials development, teacher professional development, etc.—is critical to the success of an effective reading program and approach to language use in education.

- Education sector leaders and administrators;
- Teacher pre- and in-service educators; and
- Civil society organizations and teacher unions.

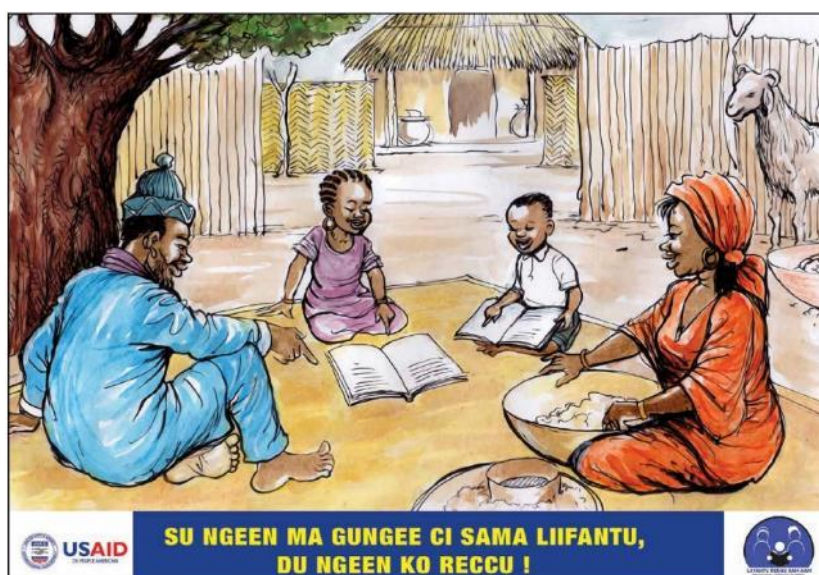
Specific activities that can be undertaken include:

- **Communicate to various stakeholders, using appropriate media, the rationale for and value of improving children's reading skills in L1 and familiar languages.** Address concerns they may have, and provide rationale for use of L1 for early skills development.
- **Engage stakeholders in information gathering,** including language mapping, materials review, etc. People's direct involvement in a situational analysis can be a powerful way to communicate issues related to language and reading and will support informed decision-making and consensus later on.
- **Identify strategies to inform and increase the knowledge of different stakeholder groups** regarding evidence-based best practices for teaching reading and language, and for effective learning more generally. This may include formal workshops, PTA or school-based management committee meetings, and radio and TV programming..
- **Acknowledge and address socio-political issues related to language;** these may be issues related to political power, ethnicity and culture, past or current conflicts, etc. While a project may not necessarily be able to solve these issues, it will be important to understand how they may affect language-related issues in reading programs, to dispel any myths, and to find ways to best support student learning.
- **Broadly communicate results of language-related plans, policies and approaches,** such as the results of a reading improvement initiative in several new languages. Use appropriate forms of communications for different target groups.



Information and guidance on how to communicate with stakeholders about language issues is included in this resource from UNESCO Bangkok (2018).

Communications and advocacy strategies should combine several approaches, including public media outreach; supporting education officials to communicate messages to district- and school-level administrators and teachers; allocating sessions in teacher, coach and administrator trainings to learning about and discussing education policies and their implications; helping teachers and administrators to directly communicate with parents about language-related policies and their implications at the school level in terms of instruction, materials and assessment; and direct public outreach via various media (e.g., radio, television, billboards, social media).



A social behavior change communications campaign in Senegal generated parent and guardian support for teaching children to read in their home language (see Example from practice 17). Credit: EdData II (USAID), RTI International

Example from practice 17:

Changing caregiver beliefs and behaviors around reading: The case of Senegal

In 2015-2016, USAID supported a pilot study in two regions of Senegal to assess whether a social and behavior change communication (SBCC) campaign could change family members' beliefs, attitudes and behaviors related to children's reading acquisition in local languages. The pilot campaign included radio programming and posters that transmitted messages about the importance of learning to read and caregivers' role in supporting their children to do so. Parents also were encouraged to attend community meetings where they learned specific literacy-related activities they could do at home. Following the campaign, significant positive changes in beliefs and attitudes toward helping their children learn to read were found in both regions where the pilot was implemented, and those individuals who reported the highest exposure to the campaign messages and events showed the most positive change. A follow-up assessment conducted in one region six months after the campaign ended found some reduction in the positive attitudes and behaviors compared to immediately after the campaign ended, but also some "durability" of the campaign's effects.

Sources: Karen Schmidt, Joseph DeStefano, and Sterling Cummings, *Social and Behavior Change Communication (SBCC) Research in Senegal: Final Report* (Research Triangle Park, NC: RTI, no date); RTI International, *Results of Social and Behavior Change Communication Pilots in Senegal and Malawi* (brief), no date

Social and behavior change communication (SBCC) strategies can be particularly helpful in getting people to change their beliefs and behaviors. **Example from practice 17** describes the successful experience of a reading pilot in Senegal that implemented a SBCC campaign to spur changes in household members' beliefs and attitudes about their role in supporting their children's reading acquisition in local languages. Additionally, the UNESCO resource *Advocacy Kit for Promoting Multilingual Education: Including the Excluded* (2018a) includes ideas and examples on conducting advocacy around language and education issues, with examples from the Asia-Pacific region. **Example from practice 18** describes how the USAID-supported LAC Reads Capacity Program built local capacity specifically around advocacy and communications. More resources related to advocacy and language are included in **Annex C**.



In Guatemala, stakeholders learn how to develop op-ed pieces and how to use their voices to support early grade learning (see Example from practice 18).
Credit: LAC Reads Capacity Program (USAID), American Institutes for Research (AIR).

Example from practice 18:

Building local capacity in LAC to improve communications and advocacy about reading and indigenous languages

The LAC Reads Capacity Program (LRCP) designed and carried out a series of capacity building workshops in Guatemala, Dominican Republic and Honduras to train education providers, think tanks, and NGOs working on literacy initiatives. The trainings focused on how to develop education blogs and digital media, publish op-eds, design social media advocacy campaigns and communications strategies, and use storytelling for behavior change and development. Blogs by indigenous education providers and experts that focused on the importance of bilingual education in mother tongues mam, k'iche' and kakchiquel were shared extensively on social media.

The LRCP also provided technical support in strategic communications and policy brief writing in early grade literacy issues to the Gran Campaña Nacional por la Educación (Great National Campaign for Education) in Guatemala, a network of 200 civil society organizations and academia that organized debates with political candidates to discuss education initiatives and government priorities, one of which focused on the importance of bilingual education. Workshop participants designed social media messages and communications campaigns in indigenous languages and shared them on social media.

Source: LAC Reads Capacity Program. *Early Grade Reading in Latin America and the Caribbean: A Systematic Review* (Washington, D.C.: USAID, December 2016).

3.5.1 Engage stakeholders to support children's reading and language acquisition outside of school

Parents, family members and community-based organizations all play a critical role in supporting children's literacy and learning outside of school. Strategies to boost caregivers' and community members' ability to support children's reading and language acquisition include:

- Providing training for formal community care-giving systems (e.g., after school care programs, clubs, children's networks), if they exist, to teach them strategies to promote language development and reading engagement.
- Provide information and demonstrate specific routines showing how caregivers (parents, siblings and extended family) can support and promote language learning and reading skills development in the home environment.
- Working with schools on how they can create bridges to families and other community actors to collaborate on promoting successful language and reading development beyond the school day. Some examples may include providing opportunities for parents and caregivers to visit schools, sharing with caregivers what children are learning and how they can support specific areas of the curriculum at home, and organizing events related to reading and language learning.

Resources on how to support parents and caregivers to support children's language and reading acquisition outside of school can be found in **Annex C**.



Stop and reflect: Communication, advocacy and support

Activity 8: Read and answer the questions below with respect to your current or recent work supporting a reading program.

1. Does your reading program have a communications and advocacy strategy that specifically addresses language issues?

- ☐ If yes, has it been implemented successfully, or does room for improvement exist? How do you know?
- ☐ If *no*, how might such a strategy be useful?

2. Are parents, family members and the community in general engaged in supporting children's reading and language acquisition at home? ☐ yes ☐ no

- ☐ If yes, have outcomes been rigorously monitored and evaluated, and what have been the findings? Is improvement needed?

- ☐ If *no*, what needs to be done to include parents, family members and community members into the program?

3.6 Monitoring, Evaluation, Research and Learning (MERL)

Before you begin: Pre-reading reflections

Before you read this section on Monitoring, Evaluation, Research and Learning, reflect on the following:

- How has language been specifically incorporated into your program's plan for MERL?
- What challenges has the program encountered with respect to language-specific MERL?
- What questions do you have regarding how language can be integrated into MERL? Write them down so you can refer to them later.

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

Monitoring, evaluation and research specific to language is essential to reading improvement initiatives. Findings will help programs to learn what is working well and what is not in terms of improving teacher practice and student outcomes. This learning will in turn guide necessary adaptations to an approach and activities.⁹²

MERL of a pilot reading initiative, or of a specific activity in a larger program, can be particularly beneficial for generating support for using the languages children speak, use and understand best for reading instruction, and learning across the curriculum. Language-specific MERL also can lead to changes to relevant language and education sector policies, teaching and learning materials, and teacher instruction policies, as well as help to identify areas where additional research is needed to further guide approaches and expansion.

Given the importance of language-specific MERL, this section provides recommendations on steps to take to integrate language issues into MERL plans and practices for reading programs. (It is not intended to provide guidance on all aspects of a comprehensive, quality plan for MERL.) **Annex C** includes resources on general best practices related to MERL, USAID-specific guidance and practices related to MERL, reporting guidance and indicators related to USAID's Education Policy, and the Global Proficiency Framework for reading and mathematics in grades 2-6.⁹³

3.6.1 Develop a comprehensive, appropriate approach to MERL

Like all high-quality MERL, language-related MERL needs to be both comprehensive and appropriate for the particular program, activity and context. It should also be informed by the situational analysis and the goals of the program. Language-related MERL activities and actions should include the following:

- **Develop a language-specific plan for MERL in tandem with program design.** Since the design of a reading program, including language-related aspects, can and should be affected by what stakeholders would like to monitor, evaluate and learn more about, an approach to MERL has to be developed early on in the process. For example, if a program would like to assess the effectiveness of the reading program on specific subpopulations, such as children whose home language is the LOI compared to those whose home language is not the LOI, or those whose home language is a dialect of the LOI, the program needs to be designed so that such an evaluation is possible. For example, the program would need to be implemented in areas where there is a sufficient sample of children who speak and use certain dialects and languages. It's therefore imperative that language-specific monitoring, evaluation and research questions be posed when the program is being developed, and not afterwards.
- **Identify what to monitor and evaluate and involve specialists across domains.** An important first step is identifying what language-specific aspects of a reading program need to be included in a MERL plan. These include:
 - **Language use in the classroom** – Are teachers using the language proscribed by the lesson plans? What is the quality of their language proficiency? Do children use the same language as the teacher to communicate with each other and with the teacher?

⁹² The term MERL is used in this toolkit to emphasize the importance of learning from monitoring, evaluation and research. Adapting an intervention or approach based on MERL is also key.

⁹³ UNESCO, *Global Proficiency Standards: Reading and Mathematics, Grades 2-6*, 2019.

- **Children's reading outcomes** – Assessments should be disaggregated by language of instruction. They should also be analyzed vis-à-vis children's reported home language to identify any differences in outcomes if home language and the LOI differ.

Specialists knowledgeable about languages issues should be included in MERL plan development so that appropriate language-related monitoring, research and evaluation questions, indicators, tools and methods of data collection are designed and implemented.

- **Monitor fidelity of implementation.** Efforts to improve the quality of teaching and learning will not yield improved outcomes if they are not implemented as intended. Yet too often, efforts to provide instruction in languages children speak, use and understand are not sufficiently monitored for fidelity of implementation (FOI). When outcomes do not match expectations, stakeholders frequently conclude that an L1-based approach to instruction is not “any better” than the status quo, when the issue may be the approach was not implemented as intended. For example, an evaluation of the impact of the Primary Math and Reading (PRIMR) Initiative in Kenya⁹⁴ found significant issues with fidelity of implementation of a “mother tongue” component of the program, including teachers not using the mother tongue for teaching. (Other implementation issues included lack of materials in the relevant L1 languages, and teachers who did not speak the assigned language of instruction.) Rather than conclude an L1-based approach to instruction does not work, which would contradict the large existing body of research supporting its effectiveness, the evaluation instead pointed to gaps in implementation as the reason the effort was not successful.

For these reasons, a new approach to using familiar languages for reading instruction is not recommended until implementers have first monitored FOI to ascertain whether the approach being evaluated is actually being implemented.

FOI monitoring related to language includes asking and finding answers to questions including the following:

- Do teachers speak/use the language of instruction fluently? Do they consistently use that language in the classroom?
- Do all students use and understand the language of instruction in classrooms?
- Do teachers have all of the required teaching and learning materials in the required languages?
- Are teachers using language-specific materials as intended? For example, are they conducting lessons in accordance with a structured lesson plan and lesson schedule?
- Are teachers participating in teacher professional development as intended? For example, are they attending the proscribed workshops and being visited by coaches as intended?
- Are assumptions related to implementation true? For example, are teachers and students regularly attending class? Is sufficient time spent “on task”?

⁹⁴ Benjamin Piper, Stephanie Simmons Zuilkowski, Dunston Kwayumba, and Arbogast Oyango, “Examining the Secondary Effects of Mother-Tongue Literacy Instruction in Kenya: Impacts on Student Learning in English, Kiswahili and Mathematics,” *International Journal of Educational Development* 59 (2018): 110-127.

Classroom observations of teachers' instruction, particularly when linked to student learning outcomes,⁹⁵ can help to identify correlations between teacher behaviors, implementation and outcomes. Interviews with teachers and coaches, and a review of project activities (such as teacher training attendance sheets), can help to answer questions related to FOI and to ascertain where gaps in implementation fidelity may exist. Shortcomings can then be addressed.

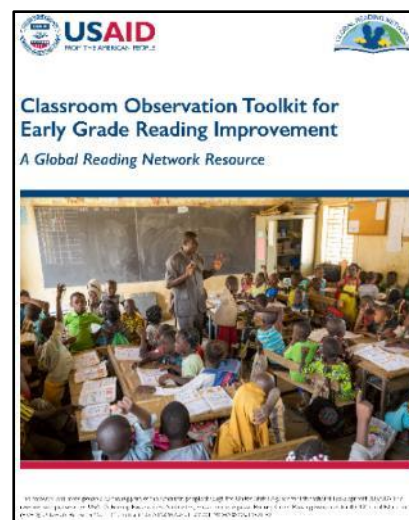
- **Monitor and assess the *quality of implementation*.** In tandem with FOI monitoring, programs should monitor the quality of implementation of a new approach to using language for instruction. Monitoring should take place on a continual basis to identify gaps that can then be addressed.

Some questions to answer regarding the *quality* of implementation include the following:

- What is the quality of teacher professional development, including workshops and coaching support?
- What is the quality of teachers' instruction?
- What is the quality of the teaching and learning materials?

Answers to these important questions about implementation will help to inform adaptations and can be used to interpret evaluation results.

- **Understand why gaps exist in implementation fidelity and quality.** If a new approach to language use for reading instruction (or instruction generally) is not being implemented as intended, or if quality is poor, information needs to be gathered or research conducted to understand *why*. For example, a study conducted as part of a USAID-supported reading improvement initiative in Malawi sought to understand how, why and to what effect teachers did not adhere to a scripted teacher's guide.⁹⁶ The study found that teachers were making significant changes to both the content and structure of the lessons, for a variety of reasons, which informed both teacher professional development and modifications to the teachers' guide. In other programs, research has found that poor student outcomes could in some situations be explained by student-teacher language mismatch⁹⁷ and to a mismatch in the dialect used for reading instruction as opposed to the dialect students use and understand.⁹⁸ High rates of teacher and student absenteeism have also been cited as a reason for poor reading outcomes.⁹⁹ These research findings are important in that they point not to the ineffectiveness of the reading intervention, but that they surface issues related to design, implementation logistics, and



The Classroom Observation Toolkit developed by REACH and the GRN provides guidance on how to use classroom observation to inform program design, monitoring, evaluation and research.

⁹⁵ For guidance on conducting classroom observation, consult: Ashley C. Hertz, Emily Kochetkova, and Alison Pflepsen, *Classroom Observation Toolkit for Early Grade Reading Improvement*, resource developed by REACH and the GRN (Chevy Chase, MD: URC, 2019).

⁹⁶ Monika Mattos and Yasmin Sitabkhan, *Malawi Early Grade Reading Activity: Scripting Study Report* (Research Triangle Park, NC: RTI, 2016).

⁹⁷ FHI 360, *Ghana Learning Language Mapping Study: Analysis Report*, 2018; Pooja Nakamura, Kaitlin Carson, Dustin Davis, Nisha Raj and Amy Todd, *Vamos Ler! Language Mapping Study in Mozambique: Final Report* (American Institutes for Research, Creative Associates International, USAID Mission to Mozambique, 2017).

⁹⁸ FHI 360, *Education program for USAID/Madagascar "Mahay Mamaky Teny!" Final Report*, 2018; SIL LEAD and Chemonics International, *Report on Operations Research for ACCELERE! 1: Sociolinguistic Mapping and Teacher Language Ability* (Washington, D.C.: FHI 360, 2018).

⁹⁹ RTI International, *Nigeria Reading and Access Research Activity (RARA): Results of an approach to improve early grade reading in Hausa in Bauchi and Sokoto states* (Research Triangle Park, NC: RTI, 2016a).

assumptions about how an approach and activities would be implemented. Once issues related to the fidelity or quality of implementation are understood, then the approach can be adapted appropriately and evaluated with greater confidence.

- **Use quantitative and qualitative approaches to monitoring, evaluation and research.** Both qualitative and quantitative approaches to monitoring should be employed. Examples of quantitative information to gather include:
 - The amount of instructional time used to teach reading in specific languages, and how it has changed over time (e.g., from intervention baseline to endline)
 - Changes in children's reading and language skills (e.g., expressive language, oral reading fluency and comprehension, writing)
 - Changes in teachers' instructional practices related to language and reading (frequency and quality of practices)

Qualitative research and evaluation will help to answer additional questions such as: What is the quality of the instruction provided? (The study from Malawi is a useful example of qualitative research.¹⁰⁰) In what specific areas do teachers experience challenges and successes with respect to implementing the reading program or other language-related instructional approaches? A combination of both quantitative and qualitative monitoring and research will help to answer important questions regarding what is working, what are specific outcomes, and what needs to be adapted, why, and how, for a particular language-related initiative to be successful.

Tools that can be used to gather the information described above include reading and expressive language assessments,¹⁰¹ classroom observation instruments,¹⁰² questionnaires and other surveys.

- **Analyze cost and cost-effectiveness.** As part of the monitoring and evaluation process, analyzing the cost and cost-effectiveness of L1-based reading and subject-matter instruction is also important to inform country-specific approaches. Careful analysis can improve program efficiency by identifying cost drivers and inform efforts to modify, expand and sustain interventions. Such analysis includes gathering information about the costs of key inputs, such as materials, teacher training, transportation, and office space, and analyzing those costs in different ways and across different dimensions (e.g., for context, time, scale, beneficiary sensitivity, etc.). Labor is another important cost category, though labor costs incurred through donor-funded assistance need to be differentiated from the costs of government personnel carrying out certain functions. Consult the resources in **Annex C** for more information and USAID-specific guidance on cost tracking and cost analysis.

Once gathered, information on cost needs to be analyzed vis-à-vis the effectiveness of the specific approach (or approaches) to improving teacher instruction and student outcomes to identify whether it should be

¹⁰⁰ Monika Mattos and Yasmin Sitabkhan, *Malawi Early Grade Reading Activity: Scripting Study Report*, 2016.

¹⁰¹ Reading assessment and classroom observation instruments that have been used to support USAID program MER can be found on USAID's EducationLinks website (www.edu-links.org), the USG's Development Exchange Clearinghouse (DEC), and RTI International's website SharEd (<http://shared.rti.org/>).

¹⁰² Ashley C. Hertz, Emily Kochetkova and Alison Pflipsen, *Classroom Observation Toolkit for Early Grade Reading Improvement*, resource developed by REACH and the GRN (Chevy Chase, MD: URC, 2019).

Example from practice 19:

Measuring cost-effectiveness of L1-based instruction: Kenya

The Kenya Primary Math and Reading (PRIMR) Initiative pilot was designed to allow measurement of the costs and the cost-effectiveness of several program scenarios at boosting student achievement. Of interest were the costs of development, publication, and dissemination of classroom materials in Kiswahili and English; coaching and instructional support; and information technology. The scenarios that proved most effective for the first two cohorts of program (treatment) schools were singled out and applied at the end of the program to the schools in the control cohort. In addition, based on the tracked costs of PRIMR-developed teaching and learning materials in Kiswahili and English, the PRIMR technical team compared the costs with what the government was currently spending on textbooks and found that the government's current allocation would be sufficient for a 1:1 ratio of books for all pupils in Kenya, if the cost of the books was more competitive. Similar cost tracking continues under the British Department for International Development (DFID)-funded portion of the program, which is supporting instruction and classroom materials in the Gikuyu and Lubukusu languages.

Source: This "example from practice" is reproduced from: Alison Pflapsen, Carol Benson, Colette Chabbott, and Agatha van Ginkel. *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes* (Washington, D.C.: U.S. Agency for International Development, 2016). The information is drawn from: RTI International. *USAID/Kenya Primary Math and Reading (PRIMR) Initiative: Final Report, 2014b*.

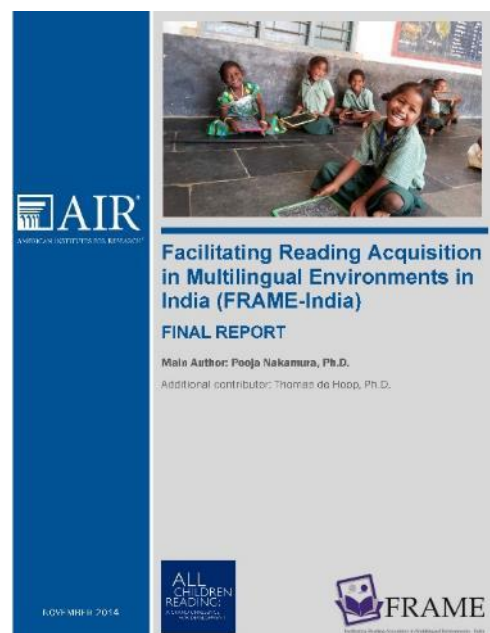
continued and possibly expanded. **Example from practice 19** describes such an effort in Kenya, where analysis of cost-effectiveness was used to inform the national expansion of an L1-based reading program.

Importantly, the cost-effectiveness of a particular approach also needs to be compared to the current cost-effectiveness of the status quo approach to teaching reading, and to language use for instruction generally. As noted in the introduction to this resource, the current approach to language of instruction in many countries is contributing to very low rates of literacy and poor student achievement, which represents a significant cost to the education system.

3.6.2 Conduct research to inform and evaluate approach

While much is known about how children learn to read and how they acquire language (see **Section 2** for a summary), much remains to be learned about how to most effectively teach children to read in specific languages, how to most effectively support children's language acquisition in multilingual contexts, and how to use language to support effective instruction across the curriculum to ensure that all children have the foundational skills they need for success.

For example, research conducted in India with the support of USAID's All Children Reading Grand Challenge for Development identified the reading skill level children need to obtain in a specific L1 or familiar language to be successful learners of English.¹⁰³ A review of research relevant to a region,



Research specific to language is needed to inform reading curriculum and instructional approaches.
Credit: American Institutes for Research (AIR)

¹⁰³ Pooja Nakamura and Thomas de Hoop. *Facilitating Reading Acquisition in Multilingual Environments in India (FRAME-India)* (final report). Washington, D.C.: American Institutes for Research (AIR), 2014.

language or particular issue can also be helpful. The USAID-supported LAC Reads Capacity Program (LRCP), for example, conducted a systematic review to understand the existing primary grade literacy research and evidence, as well as to identify gaps, in the evidence. One of the key gaps found includes knowledge about effective reading strategies for students in indigenous languages.¹⁰⁴

USAID's **Foundational Skills Learning Agenda** aims to catalyze research and use of evidence-based best practices in basic education programming, with language of instruction a specific focus.¹⁰⁵ To answer the Learning Agenda key question "How can countries most effectively address issues related to language of instruction to improve learning for all students?", programs are encouraged to develop research activities aimed at answering the following questions, which are discussed in detail in the Learning Agenda:

- What are the most effective ways to support acquisition of reading in a second language once learners can read in a first language? When should reading in a second or third language be added to the curriculum?
- How can education systems most effectively support reading instruction in instances where learners in the same class do not use and understand the same language?
- What can education systems do in contexts where teachers are not proficient in the language of instruction?

Additional related questions to explore include the following:

- What skills and instructional strategies are most effective for teaching literacy in specific languages?
- What is children's language and reading progression over time across specific languages?
- What are skill-specific language competencies and vocabulary thresholds for students to successfully transition from learning in an L1 to learning in an L2 or Lx?
- What modalities of teacher training are most effective in helping teachers to provide quality language and reading instruction?

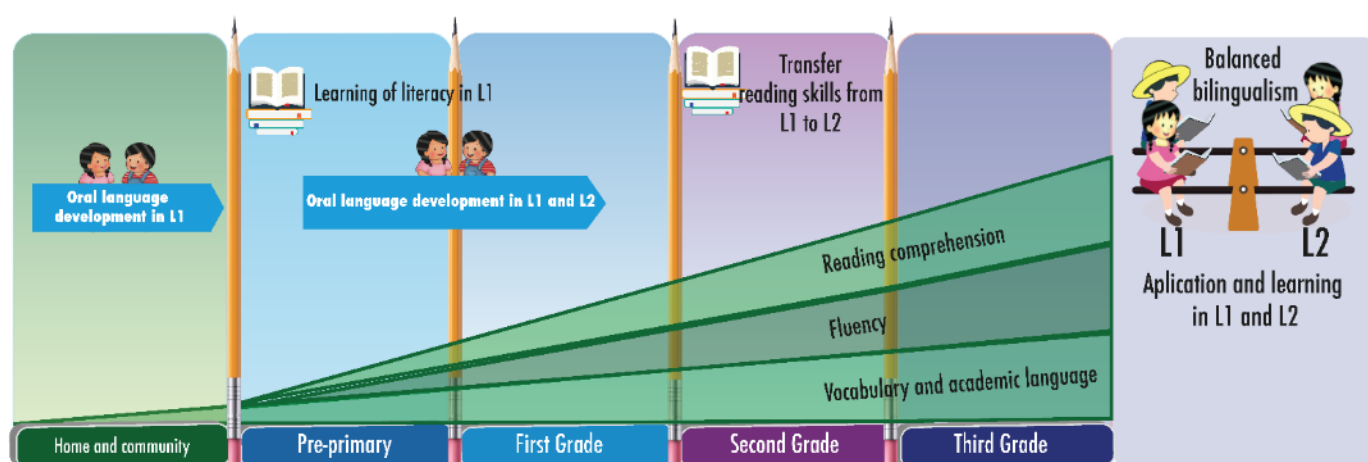
Depending on the question, the appropriate research methodology and means of collecting information need to be identified. It's important to note that research does not necessarily need to be extensive or "expensive," a concern sometimes expressed by program implementers. Rather, research can be embedded in a program's effort to monitor and evaluate a particular intervention or component of it. Other small-scale research that can be useful to conduct includes desk reviews of existing studies; focus groups on specific topics; classroom observations in select schools (such as those conducted in Malawi); research on a particular language (such as the research conducted in Madagascar (see **Example from practice 4**) and Cambodia (see **Example from practice 7**); and in-depth case studies. All of these can provide timely and useful information as a program is being implemented.

¹⁰⁴ Rebecca Stone, Thomas de Hoop, Andrea Coombes, Mariela Goett, Mitchell Morey and Kevin Kamto, *What Works to Improve Early Grade Reading in Latin America and the Caribbean: 2016 Update of a Systematic Review*. LAC Reads Capacity Program (Washington, D.C.: American Institutes for Research, 2015).

¹⁰⁵ USAID, *Foundational Skills Development Learning Agenda* (Washington, D.C.: USAID, 2019).

More comprehensive, long-term research, such as longitudinal studies, can help a country to gain insights and answers to key questions related to language and learning that are invaluable in helping to inform long-term investments and expansion of a reading program. Longitudinal studies of teacher practices and student outcomes, once thought to be too difficult to conduct in low-income country contexts, have become increasingly feasible and worthy of donors' and researchers' time and financial investment.¹⁰⁶ Even two or three years' worth of data on a sample of children can be extremely beneficial in helping a country to make informed decisions related to curriculum, teacher training and language-related policies and practices. For example, longitudinal studies can help policy makers and implementing partners understand how children's reading skills progress from one grade to the next (see **Example from practice 20** describing such a study in Guatemala), how reading skill levels can be predicted from one grade to the next based on particular skills for certain languages, and what language thresholds children need to acquire in one language before learning in another. Following teachers, too, in tandem with students would be invaluable in helping to understand how teacher skills and practices change over time, and how these relate to their students' outcomes. An investment of both time and resources in longitudinal studies would pay large dividends in the future.

Expected trajectory of learning to read in bilingual contexts



A study in Guatemala found children struggle to achieve bilingual learning standards. Credit: Guatemala Lifelong Learning project (USAID), Juárez & Associates

¹⁰⁶ A longitudinal study in Kenya recently traced primary grade readers who participated in a literacy RCT in Kenya called HALI from 2010 to 2018 to explore issues related to repetition and drop-out. The results are forthcoming from Margaret (Peggy) Dubeck and colleagues (Dubeck, personal communication, September 27, 2019). For an overview of HALI, consult: Sharon Wolf, Elizabeth L. Turner, Matthew C. H. Jukes, and Margaret M. Dubeck, "Changing Literacy Instruction in Kenyan Classrooms: Assessing Pathways of Influence to Improved Early Literacy Outcomes in the HALI Intervention," *International Journal of Educational Development* 62 (2018): 27-34.

Example from practice 20:

Bilingual learning trajectories: An assessment from Guatemala

According to the Guatemalan National Curriculum, children are expected to acquire basic reading skills in their mother tongue, an indigenous Guatemalan language, by the end of first grade, while at the same time developing oral language skills in the L2, Spanish. In second grade, the focus is on transferring skills learned in the mother tongue, or L1, to learning to read in Spanish, the L2. In grade 3, students learn to read in both the L1 and L2. A longitudinal study conducted under the USAID-supported Lifelong Learning project, implemented from 2015-2017 in the Western Highlands of the country, was designed to compare these expected versus actual trajectories in children's L1 and L2 reading skills.

The longitudinal study found that children's reading skills progressed over time, but their skill level was insufficient to be able to learn subject content across the curriculum by grade 3. The study authors recommended that teachers should formatively assess various reading competencies beginning in first grade to know if their students are achieving expected competencies. They also recommended greater use of explicit instructional teaching methods appropriate for the bilingual context in Guatemala. In particular, the authors noted that second grade teachers should be provided with support and tools to help students transfer their L1 reading skills to learning Spanish.

Source: Sophia Maldonado and Leslie Rosales, *Learning to Read... Expected and Actual Trajectories. A Longitudinal Study of Children in Guatemala* (Lifelong Learning Policy Brief No. 2, 2018).

3.6.3 Disaggregate results by language and other characteristics

Reading improvement intervention results should disaggregate outcomes by language to get a comprehensive picture of the impact of a particular program on learners with various profiles, and to identify if any disparities in achievement exist between and among groups. This includes disaggregating results by the language(s) students are learning to read and students' home language(s). Additionally, disaggregation of student data by key subpopulations such as girls and boys, refugee status, geographic area, and disability status can also help to identify how the languages used for instruction may be helping or hindering outcomes for particular groups. This can in turn support improvements in policy and practice.

Analysis should be conducted to identify the level of achievement of students whose L1 or home language is the same as the language used for reading instruction, as well as for students whose L1 or home language differs. Differences in outcomes may indicate a need to provide reading instruction in additional languages (or dialects), or to adapt the approach to reading instruction to second-language learners. For example, an evaluation of the USAID-supported Prioritizing Reform, Innovation and Opportunities for Reaching Indonesia's Teachers, Administrators, and Students (PRIORITAS) program found improvements in children's reading ability overall. However, the oral reading fluency and comprehension achievement of children who spoke the language of instruction (Bahasa Indonesia) at home was greater than that of children who did not use the LOI at home.¹⁰⁷ In Northern Nigeria, too, disaggregation of assessment results from a pilot Hausa reading intervention found that children who reported speaking Fulfulde at home had poorer reading outcomes compared to their peers who reported speaking Hausa at home.¹⁰⁸

¹⁰⁷ RTI International, *Endline Monitoring Report, Volume 3: An Assessment of Early Grade Reading. How Well Children Are Reading in USAID PRIORITAS Districts - Cohorts 1, 2, and 3* (Research Triangle Park: RTI International, 2017).

¹⁰⁸ RTI International, *Nigeria Reading and Access Research Activity (RARA): Results of an Approach to Improve Early Grade Reading in Hausa in Bauchi and Sokoto States* (Research Triangle Park: RTI International, 2016a).

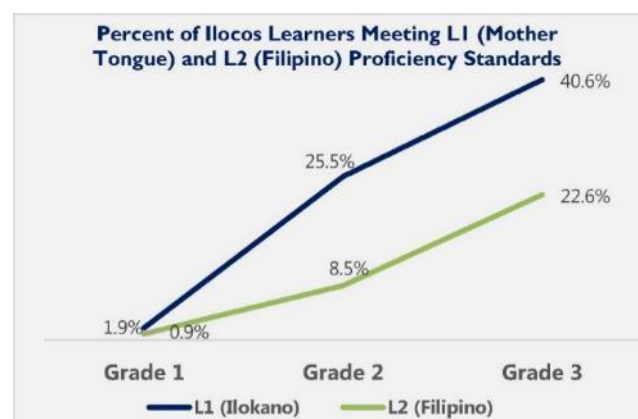
Additionally, linking children's reading outcomes to information on teachers' instructional practices and language proficiency can be incredibly useful in understanding how teachers' skills affect the quality of instruction and children's learning outcomes. Findings may help to identify differences in outcomes based on teacher proficiency and language use in classrooms, which can be used to support changes in policy and practice related to teacher professional development, placement in schools, and need for ongoing support in the classroom (e.g., coaching).

3.6.4 Assess and report language and language skills appropriately

Just as the instructional approach for teaching languages may differ depending on the characteristics of the language, so, too, should reading assessment. Assessment may differ by language (including for sign language) in terms of the skills tested and how results are reported. For some languages, certain ways of measuring fluency may be more appropriate than others. (For example, for agglutinative languages, or languages in which words are composed of distinct morphemes that have their own meaning, the unit of measurement might be the morpheme—the smallest meaningful unit in the grammar of a language.) Assessments also should be adapted depending on whether they are assessing a child's first or additional language skills, since the skills and way in which they are measured may differ.

Because languages differ, comparisons of reading outcomes across languages must also be approached cautiously. Presenting results for diverse languages in the same way, such as correct words per minute, can result in an inaccurate picture of achievement, and potentially negative consequences for teachers and students. (This is because word length differs between languages, with some languages requiring more words than others to communicate the same information.) Rather than compare fluency across disparate languages, other metrics may be more appropriate. The **Global Proficiency Framework (GPF)** for reading and mathematics in grades 2-6 is a useful resource that will help countries to make cross-language comparisons based on common proficiency standards. See **Section 3.7.4, Develop language-specific standards and benchmarks** for more information on developing reading standards. Assessments designed specifically for multilingual learners (discussed in **Section 3.2.6, Align assessments to the languages, curriculum and instructional approach**) will also help to accurately capture what students know across languages. Specialists in reading, language and measurement should be engaged to collaboratively develop assessment instruments across languages and interpret and present their findings.

3.6.5 Use MERL findings to modify and improve what is being done



Research in the Philippines found that most students had not acquired sufficient proficiency in Filipino or English to learn in those languages in grade 4, as required by government policy (see Example from practice 21). Credit: Basa Pilipinas (USAID), Education Development Center, 2017

Findings from early grade reading and other learning assessments catalyzed efforts to provide more instruction in languages children read and understand. As programs continue to monitor, assess and evaluate their impacts, findings should be used appropriately to improve continued implementation and expansion. This might mean: increasing the amount of time allocated for teaching children to read in two languages; adapting an approach to instruction to make it more effective for children who speak a specific language dialect; enhancing teacher professional development to target areas identified for improvement; modifying policies on teacher school placement; or

addressing key assumptions in theories of change that prevent these interventions from having the intended effects. For example, an evaluation in the Philippines' approach to using language for instruction in the early primary grades recently found that instruction in three languages was not achieving the intended outcomes. As described in **Example from practice 21**, many children in the country are not becoming sufficiently proficient in the language used for instruction in grade 3, a finding that has led to several recommendations for changing the instructional approaches that are now under consideration.

Lastly, programs should take care to interpret and use MER findings *appropriately*. Evaluation and research findings always have their limitations, and one study alone may not provide sufficient information to make definitive recommendations related to every aspect of a program. Moreover, findings that do not show positive effects should not necessarily be interpreted to mean that a particular approach should be discontinued. Rather, the results need to be carefully interrupted in terms of constraints (e.g., short implementation time period, high rates of teacher absenteeism, insufficient teacher training, lack of implementation fidelity, insufficient amount of reading materials) to better understand what may

Example from practice 21:

Assessing a trilingual approach to literacy and learning: Findings from the Philippines

In 2012-2013, the Philippines Department of Education began implementing a new policy to provide mother tongue-based multilingual education (MTB-MLE). According to the new policy, in grade 1, children are taught to read in the mother tongue identified for their region, with Filipino and English taught as oral language subjects. In grade 2, students learn to read and write in Filipino and English, with instruction continuing into grade 3. In grade 4, English is the language of instruction for math and science, and Filipino for other content subjects. Children are no longer taught to read or taught academic content in their mother tongue.

After a few years of implementing the new policy, the Philippines Department of Education, in collaboration with USAID and its partners, conducted an evaluation of this approach to identify whether desired results were being achieved. The evaluation found the following:

- Fluency in L1 was associated with higher fluency in L2 (Filipino) and L3 (English).
- However, most students had not become proficient readers in their L1 and had not acquired sufficient proficiency in Filipino or English to transition to learning *in* those languages by grade 4.
- The proficiency of children for whom Tagalog—the basis of Filipino—was not their L1 did not “catch up” to their peers whose home language was Tagalog.

The evaluation suggested several reasons why the MTB-MLE policy is not achieving all of its expected results:

- Children are expected to learn too many languages too early (grade 1) and too quickly (by the end of grade 3). This is compounded by insufficient time in the curriculum to learn three languages.
- Teachers do not have the skills to teach 3 languages well. These skills include their own literacy skills in the target languages and knowledge of effective approaches to L2 and L3 instruction.
- Both the quantity and quality of teaching and learning materials may be insufficient for learning the various languages.

Given these findings, the evaluation recommended that students would likely benefit from continuing instruction in their L1 rather than switching to Filipino and/or English instruction in grade 4, as well as supporting teachers to improve their instruction across languages.

The findings from the Philippines are of interest to other countries considering a trilingual approach to instruction, as well as a bilingual approach in which the LOI changes from grade 3 to grade 4. Children are likely to need more time to solidify their skills in L1 (e.g., beyond grade 3), as well as the opportunity to continue to learn in their L1 or other familiar language.

Source: Education Development Center, Inc. (EDC). Mother Tongue-Based Multilingual Education in the Philippines: A Study of Literacy Trajectories (Washington, D.C.: USAID), 2017

need to be improved. The same is true when outcomes are positive: Causal mechanisms and conditions for success need to be investigated and well understood in order for the approach to be recommended for ongoing implementation and expansion.



Stop and reflect: Monitoring, evaluation, research and learning (MERL)

Activity 9: This activity provides an opportunity for individuals and/or program teams to reflect on how their monitoring, evaluation, research and learning plans incorporate language-specific issues. These reflections can help to pinpoint aspects of a MERL plan that could better incorporate language.

1. **Does your program's approach to MERL specifically reference language?** If yes, where and how? Based on what you've read in this section, how could your program better integrate language in its plan for MERL?

2. **In what ways does your program disaggregate results by language, including home language and language of instruction?** In what ways could your program better disaggregate data by language, as well as other important learner, teacher and community demographics, to understand how outcomes may differ by group?

3. **For which language-related issues do you feel your program needs to have more or better information to inform decision-making?** What monitoring, evaluation and/or research activities could be conducted to gather the necessary information?

3.7 Policies, Standards and Plans

Before you begin: Pre-reading reflections

Before you read this section on Policies, Standards and Plans, reflect on the following:

- What policies or other official plans exist to provide education stakeholders with guidance on language-related issues? If you are unaware of official policies and practices, list questions you have about them.
- What questions do you have regarding reading standards and benchmarks? Write them down so you can refer to them later.
- How might your reading improvement initiative support improvements in language-related policies and plans?

At the end of this section, you will have an opportunity to reflect on what you have read and apply it to your work and context.

The process of designing and implementing a reading program may surface the need to review and modify existing policies, standards and plans that relate to language use in education. For example, reading programs have increasingly recognized the vital role of policies, standards and plans related to reading curriculum; LOI selection and use for specific schools; teacher professional development; teacher placement; and the development and procurement of education materials.

While the process of developing or modifying policies, standards and plans may require an investment of time and resources, it is one worth undertaking. Codifying new or improved approaches to language use and reading instruction into policies, standards and plans will lay a foundation for long-term change by creating the guideposts and roadmap that stakeholders can reference in the future. Key steps to take to improve policies, standards and plans as they relate to reading and language issues are described below.

3.7.1 Review education policies and plans through the lens of language

Language is explicitly or implicitly implicated in education sector policies and plans. These include policies related to the language of instruction; curriculum and learning standards; teacher professional development; teacher placement in schools; materials development and procurement; and student assessment and promotion, to name a few major areas.

Efforts that seek to improve reading and language instruction, and learning outcomes generally, should undertake a review of education sector policies to identify to what extent policies support or hinder good practices with respect to language use for instruction, and whether they are aligned with new, evidence-based efforts to improve instruction and learning outcomes. The process of reviewing (and potentially modifying) an existing policy should include broad stakeholder consultations.

A systematic review of policy is recommended to include the following:

- **Review outcomes of current policy.** Change should be based on evidence regarding the effectiveness of existing policy. It's therefore important to understand the outcomes and impact of a given policy, such as those related to LOI, language use for teacher preparation, teacher school assignment, and student assessment. What is the

Key ideas:

Policies, standards and plans

- ✓ Education policies and practices need to be reviewed with language in mind; this includes policies related to language of instruction, teacher preparation and teacher school placements.
- ✓ Pilot studies and research can inform improvements to language-related policies, plans and practices by generating context-specific evidence regarding effective approaches to language use for instruction.
- ✓ Education policies and plans may need to be modified to address language issues, improve teacher preparation and support, and improve reading outcomes for children; reading programs can play a useful role in supporting such efforts as appropriate.
- ✓ Language-specific standards and benchmarks are necessary to measure progress over time; the Global Proficiency Framework for reading and mathematics improvement in grades 2-6 should be consulted and referenced as part of this process.
- ✓ A plan for improving early grade reading (or foundational skills generally) can be useful for helping countries to comprehensively assess and address language issues across multiple areas; USAID and its partners have and can continue to play an important role in developing such a plan.

impact of specific policies on teachers' preparedness, the quality of instruction, and student access and achievement? Answers to these questions will help create a case for change.

- **Review policy for alignment with evidence-based teaching and learning practices.** In what ways are current education policies (with respect to language(s) of instruction, teacher professional development and placement, etc.) aligned and not aligned with the evidence-based best practices summarized in **Section 2, *Effective reading and language instruction—What works?*** and described in **Section 3, *Planning for language use?*** How could specific education policies be modified to support evidence-based good practices and an approach to language that is appropriate, equitable and effective for the context? **Example from practice 22** describes how a reading program in Ghana drew on evidence-based practices to provide recommendations on LOI policy changes.
- **Review policy vis-a-vis equity considerations and outcomes.** Policies related to education and language have the potential to privilege some groups and cultures and to perpetuate disadvantage for others, intentionally or inadvertently. Examples include selecting only one language for official classroom use or neglecting to provide teacher training in the languages of instruction. Therefore, language-related policies and practices should be reviewed with an eye towards equity and inclusion. Do the policies and practices exclude some groups? If so, how can they be modified to improve education access and learning outcomes?

For a review of language of instruction policies in 21 countries in Southern and Eastern Africa, consult the 2016 UNICEF report *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa*.

3.7.2 Conduct pilot studies and research to inform changes to language-related policies, practices and plans

While donor-funded education initiatives usually need to comply with existing policies and education sector plans, they can also serve as catalysts for change. Research and pilot studies—such as those conducted through USAID-supported reading initiatives—can generate context-specific evidence on appropriate and cost-effective strategies for improving teaching and learning; demonstrate feasibility; and create a strong case for updating language- and reading-

Example from practice 22:

Improving primary grade reading: A catalyst for reflection on LOI policy and practice in Ghana

Over nearly three decades, the language of instruction policy in Ghana has changed 10 times. As for 2019, policy mandates that 11 Ghanaian languages be used for the language of instruction from kindergarten through grade 3. English is used for instruction beginning in grade 4. To better facilitate children's transition from one LOI to another, the USAID-supported Ghana *Learning* reading program has recommended the policy be updated to support a late-exit transition bilingual model. This approach would allow children to continue learning in a Ghanaian language beyond grade 3, which will in turn support their acquisition of English and ability to learn academic content in a more familiar language. The proposed policy modification would explicitly recognize Ghanaian languages and English as “two pillars of successful learning,” creating a foundation for ongoing work to improve literacy, language and learning outcomes in the country.

Source: Barbara Trudell, “The Role of Linguistics in the USAID Partnership for Education: Learning Activity in Ghana,” presented on the panel: *Developing Early Grade Reading Materials in 11 Languages: Learning in Ghana* at the annual conference of the Comparative and International Education Society (CIES), 2018.

related policies and plans. Pilots and research studies provide many opportunities for stakeholders to be actively engaged in dialogue and “hands-on” work related to language (e.g., language mapping, materials development, data collection, interpretation of results) that can build support for L1-based approaches to reading and general instruction.

For example, evidence indicates that reading/language arts instruction should take place daily, for at least 90-120 minutes. Yet in countries where USAID and others are implementing reading programs, the amount of time allocated to literacy and learning is insufficient. In Nigeria, a pilot reading initiative included increasing the amount of time available for reading instruction. An evaluation found that teachers increased the amount of instruction provided, which in turn contributed to improved student learning.¹⁰⁹ The pilot findings led education authorities in two states to officially increase the amount of time for instruction to 40 minutes. Such a change is fundamentally important to providing children with an enabling environment to learn and can serve as a “foot in the door” for other modifications to policy and practice.

Research conducted as part of a reading improvement effort can also have an impact. For example, the language mapping activities mentioned in **Section 3.1.5** generated information that led to deeper discussion within the countries on many issues salient to language and literacy, including the need to review and update teacher placement policies and practices to support “teacher-student language match” (Ghana), the need to update the LOI assigned to certain areas or schools (DRC), the need to assess children’s oral and expressive language skills to identify the appropriate approach to reading instruction (Mozambique), and the need to further investigate whether additional languages/dialects need to be used for reading instruction (Afghanistan).

To result in positive change, pilot studies must be of high-quality, so they are credible; need to involve stakeholders; and the results and their implications need to be well-communicated with specific stakeholder groups. The process of designing, implementing and evaluating a reading pilot can, if done well, generate consensus and support for change that may not have previously existed. This has found to be particularly true when it comes to generating support for reading instruction in languages children read and understand. Bringing diverse stakeholders together, including education officials, parents and other decision-makers throughout the design, implementation and evaluation process can help them gain a deep understanding of issues and create



A comprehensive approach to improving reading outcomes in Mozambique has resulted in changes to language of instruction policy and practice (see Example from practice 23). Credit: Mozambique Vamos Ler! (USAID), Creative Associates International

¹⁰⁹ RTI International. *Nigeria Reading and Access Research Activity (RARA): Results of an Approach to Improve Early Grade Reading in Hausa in Bauchi and Sokoto States* (Research Triangle Park, NC: RTI International, 2016a).

the motivation and shared sense of purpose for change. **Example from practice 23** describes in detail how efforts to use an L1-based approach for instruction in Mozambique have greatly expanded in the country as a result of focused efforts to improve reading.

Example from practice 23:

Building a case for L1-based instruction: The case of Mozambique

In Mozambique, efforts to build support for L1-based instruction have taken place over decades, yet had not resulted in large-scale implementation. The USAID-supported *Vamos Ler!* initiative has been able to build on these efforts by: (1) undertaking research to understand the sociolinguistic context and apply findings to decision-making; (2) identifying a linguistically appropriate approach to L1-based reading instruction; (3) developing teaching and learning materials in Mozambican languages; (4) providing system-level support for bilingual education expansion; and (5) implementing a large-scale intervention in two of the most populated, underserved provinces in northern Mozambique.

First, three studies were conducted to understand the sociolinguistic context. A language mapping study (see **Annex D** for details) was conducted to measure children's oral language proficiency in each language they identified knowing. The information gathered helped policymakers and education specialists to identify multilingual classrooms; to identify whether children's language proficiency matched the official LOI assigned to schools; and to identify the best choice of language for initial literacy instruction. This was complemented by two studies that looked at the knowledge, attitudes, and practices of community members, teachers, and other education actors regarding bilingual education in Mozambique. The findings have been used to inform ongoing work to improve the teaching and learning of reading in Mozambique.

Vamos Ler! used the background research to inform an approach to reading instruction for three Mozambican languages (Emakhuwa, Elomwe, and Echuwabo) and Portuguese. The program also developed teacher's guides, 230 decodable texts integrated into student books, and 114 decodable and leveled supplementary readers for grades 1 and 2 (with grade 3 materials slated to be developed in 2020). To date, the L1 approach to reading instruction has been implemented in nearly 3,000 schools, with a goal to reach nearly 1 million grade 1-3 children, and over 11,000 teachers.

Since 2017, *Vamos Ler!* has supported a series of national events and workshops on bilingual education, including on the National Strategy for Bilingual Education. These efforts helped lead to bilingual education being mandated for grades 1-3 in 21 districts in Nampula and Zambezia provinces, a deviation from the 2002 curriculum policy, which allowed schools and communities to choose an approach. This has had a catalyzing effect in facilitating more rapid expansion of bilingual instruction in other districts and provinces. As a result, in 2019, *Vamos Ler!* supported the development of a scope and sequence for the remaining 14 national languages.

The combination of targeted research, materials production, national dialog and systems support, social behavior change campaigns, and a large-scale intervention have increased support for L1-based instruction among all stakeholders. As a result of these efforts, Mozambique has revised its policy to gradually expand bilingual education nationally in grades 1-7 by 2029.

Sources:

- Corrie Blankenbeckler, *More than Stories: Developing Decodable and Leveled Texts in Mozambique*, Presentation delivered at the annual conference of the Comparative and International Education Society (CIES), San Francisco, CA, March 2019.
- Haiyan Hua, David Noyes, Willem van de Waal, and Adam Turney, *Vamos Ler! Quantitative Study of Teacher Knowledge, Attitudes, & Practices (KAP) in Mozambique: Final Report*. World Education, Inc., Creative Associates International, USAID Mission to Mozambique, 2017.
- Ministry of Education and Human Development, Mozambique, *Estratégia de Expansão do Ensino Bilíngue, 2020-2029*, 2019.
- Pooja Nakamura, Kaitlin Carson, Dustin Davis, Nisha Raj, and Amy Todd, *Vamos Ler! Language Mapping Study in Mozambique: Final Report* (American Institutes of Research, Creative Associates International, USAID Mission to Mozambique), 2017.
- Susan Shulman, *Vamos Ler! Qualitative Study of Community Knowledge, Attitudes, & Practices (KAP) in Mozambique: Final Report*. Overseas Strategic Consulting, Ltd., Creative Associates International, Inc. (CAII), USAID Mission to Mozambique, 2017.
- For a background on LOI policy in Mozambique, see Carol Benson, "Bilingual Schooling in Mozambique and Bolivia: From Experimentation to Implementation," *Language Policy* 3, no. 1 (2004): 47–66.

3.7.3 Modify existing policies and plans to address language issues and improve reading outcomes

A review of education sector policies and practices, alongside findings from reading program pilots and research, is likely to identify the need for change. Ideally, a country might decide to develop a larger “national language policy” that would align language use across sectors, including education. Policies related to language use in education have the great potential for positive outcomes if they:

- **Are based on reliable and current information about languages and their users.** As described in **Section 3.1**, this requires information from recent language mapping studies and an analysis of language orthography.
- **Align with evidence about how children learn to read, acquire additional languages and learn subject matter best.** This means focusing on building a strong foundation in children’s L1 and providing instruction in the L1, while at the same time providing opportunities for acquiring additional language skills.
- **Emphasize the importance of bi- and multilingualism.** For example, in Ghana, advocacy around effective language use has emphasized “Ghanaian language and English as two strong pillars of successful learning.”¹¹⁰
- **Clarify how different languages are to be used and in what grades.** Children will benefit the most in terms of literacy and learning outcomes when languages used for reading instruction are also used to teach other subjects.
- **Are comprehensive in nature.** Issues that need to be addressed include the languages to be used for instruction, teacher professional development, teacher school assignment, assessment, and other issues. Policies should also be aligned across levels (e.g., primary to tertiary).
- **Address equity issues.** Policies and plans should help to remedy, and not exacerbate, equity issues, including access and outcomes due to ethnolinguistic affiliation, refugee status, or disability (e.g., the needs of children who are deaf/hard of hearing or blind/visually impaired).

Policies should also be accompanied by guidance that outlines a plan for implementation, including what actions need to be taken, by whom and when. This could take the form of a “plan for language use in education,” which could conversely be the *starting point* for policy change. Such a plan could describe a comprehensive approach to language use, and then existing policies could be modified accordingly. A plan for improving reading, described in **Section 3.7.5**, *Develop a plan for reading/foundational skills improvement*, can be the first step towards the development of a more comprehensive plan for language use in education.

3.7.4 Develop language-specific standards and benchmarks

Teachers, learners, parents and education systems need to know what children are expected to achieve and by when. This necessarily includes standards specific to literacy and language. The recently developed Global Proficiency Framework¹¹¹ provides common proficiency standards to help countries set internationally comparable benchmarks for reading (and mathematics) achievement in grades 2 through 6. As described in **Textbox 5**, the GPF is a useful resource to support reading improvement initiatives in identifying performance standards against which benchmarks

¹¹⁰ Barbara Trudell, personal communication. September 27, 2019.

¹¹¹ UNESCO, *Global Proficiency Standards: Reading and Mathematics, Grades 2-6*, 2019.

can be developed for specific languages. A benchmark, in turn, is the cutoff point, or assessment score, that designates a performance standard has been met based on a given assessment. (For example, the benchmark for oral reading fluency would be a specific number of correct words per minute.) Benchmarks should be based on objective evidence of the skill level needed to achieve the proficiency standard; they should not be based on learners' current performance. Targets—or the goal for the number or percentage of children that will reach a benchmark for a given grade in a given period of time—should be identified based on what is realistic for the context. They may also change over time and vary across populations.

Many USAID-supported reading programs have developed standards, benchmarks and targets over the past few years. As USAID and its partners have gained more knowledge and experience doing so, methods and tools have evolved. Current consensus on the most appropriate and feasible evidence-based approach in the context of USAID-supported reading improvement initiatives is an approach

known as policy linking. Policy linking is a process that allows countries to use existing assessments to set corresponding benchmarks that define minimum levels of proficiency.¹¹² If the assessments are linked to the Global Proficiency Framework standards, then the corresponding data can be compared across contexts, languages and time to better track outcomes and to target interventions appropriately.

Many programs have reported that this process of developing benchmarks has been incredibly useful in bringing key stakeholders together to understand the importance of reading skills acquisition, how skills are measured, how assessment is conducted, and why it's important to set standards, benchmarks and targets to be able to track progress over time. **Annex C** includes a list of resources that should be consulted to support policy linking and the development of standards and benchmarks for reading and mathematics.

Textbox 6. Setting comparable standards for literacy: The Global Proficiency Framework¹

The Global Proficiency Framework—developed through a collaboration between USAID, UNESCO, DfID, the Gates Foundation, and ACER—defines proficiency levels children are expected to obtain at the end of each of grades two through six. Developed by reading and mathematics specialists representing universities and organizations working to design and implement reading improvement initiatives, the GPF represents a global consensus of the minimum skills and competencies learners should be able to demonstrate at key points along their learning trajectory.

Using UNESCO's International Bureau of Education's (IBE's) Global Content Frameworks of Reference for Reading and Math and national and regional content and assessment frameworks as references, the GPF provides detailed proficiency expectations that countries and national and regional assessment organizations can use to link existing reading and math assessments to Sustainable Development Goal 4.1.1. These standards can be used by USAID and its implementing partners to identify the appropriate reading proficiency benchmarks by language. Using the same proficiency standards for benchmarks will allow for comparisons between contexts and languages. For more information, consult the Global Proficiency Framework and USAID's resources on policy linking.

*Sources: UNESCO, *Global Proficiency Standards: Reading and Mathematics, Grades 2-6*. 2019; USAID, *Toolkit for Setting Internationally-linked Benchmarks in Early Grade Reading and Math* (Washington, D.C.: USAID, 2019).*

¹¹² More information and resources about policy linking can be found at USAID's EducationLinks website: <https://www.edu-links.org>.

3.7.5 Develop a plan for reading/foundational skills improvement that includes a focus on language

While policies related to language are important, they are not necessarily the only means of improving how language is used in the education sector. Developing a national approach to improving reading or a plan for improving foundational skills has been found to be an effective strategy for addressing language issues and catalyzing discussion on language, and in particular the need to provide instruction in children's L1/home languages. Such a plan can be leveraged to achieve broader system-wide change on issues related to language use in the classroom. Moreover, a plan for reading/foundational skills improvement can be more flexible than policy and allow for timely adaptation as new approaches are trialed and evaluated within the course of a literacy/numeracy improvement initiative. The Department of Education in the Philippines, for example, included issues of language use in education in its Enhanced Basic Education Act of 2013. This was followed by a series of implementing rules, regulations, and guidelines, which outlined in more detail issues related to language use in curriculum content, materials development and distribution, and teacher training.¹¹³

Bringing strong, relevant evidence from both research and practice to the table is an important first step in increasing understanding of the need for a plan to improve reading and language use more broadly. However, because language-related policies and practices are tightly bound to political, historical, and cultural considerations, these issues must also be addressed.

USAID and its partners can play an important role in bringing stakeholders together to collaborate on a plan for reading improvement (or foundational skills improvement) that is feasible, acceptable to all, and implemented and supported over the long term. Such a plan should **emphasize and address language issues** in areas including reading instruction, curricular content, teacher professional development, and other key areas discussed in this resource. Such a plan should outline major activities and specific tasks to carry out over the short-, medium- and long-term, institutions and people responsible, the timeline for implementation, and resources required (e.g., a budget). At the same time, the **plan should be flexible** so that MERL findings can be applied to adapting the plan, which should be widely circulated and available to all.

Alignment across institutions and departments within the education sector is also critical. Curriculum development units, teacher training institutions, departments responsible for learning assessment, and other agencies need to work together to align the plan's approaches, activities and policies. In addition, **coordination is needed among the various education levels** (early childhood development, primary education, secondary and tertiary education and, potentially, nonformal education providers as well).

A successful plan for improving reading instruction and language use in education should allow for **decentralized and local decision-making**, as evidenced by a number of countries currently undertaking reforms to provide L1-based, bi- or multilingual education. Districts and schools need to be able make decisions on which languages to use for instruction based on the languages currently spoken in their area, while still maintaining alignment with evidence-based best practices. Ethiopia, for example, was able to roll out local language instruction in 23 languages because certain

¹¹³ Philippines Department of Education, "Guidelines on the Early Language, Literacy, and Numeracy Program: Professional Development Component," 2015.

aspects of leadership and decision-making were decentralized.¹¹⁴ Regional education bureaus along with linguists determine which languages meet local needs, then develop materials in appropriate languages based on national curriculum guidelines.¹¹⁵ In Uganda, the government has provided guidelines to language communities regarding the criteria for considering use of a language in education. Language communities are now working to meet these requirements, and language use in education has become a shared responsibility of the community and government.¹¹⁶

Still, strong support from a centralized government education office may be needed, at least initially and in key areas. This may include providing a clear, research-based curriculum for adaptation into different languages; supporting the production of teaching and learning materials, as well as assessments, in the target languages; and coordinating technical support and donor involvement. For example, such centralized support has been provided by the Department of Education in the Philippines, which is implementing a multilingual approach to learning in 19 languages, with USAID supporting reading improvement in four major languages through the Basa Pilipinas project.¹¹⁷ In Ethiopia, USAID's support for reading improvement helped to implement an already existing policy to provide L1-based instruction, as described in **Example from practice 13**. The AU Continental Framework on Book and Reading Policies for Africa provides a road map for African member countries to formulate National Book and Reading Policies that will enable each country to address the various challenges facing the book publishing industry.¹¹⁸

Lastly, a plan for reading improvement, or improved use of language in education, should be accompanied by a realistic **short- and long-term timeline and budget**. An estimated budget for each component is helpful to identify where funds may be needed, and whether these are one-off expenses (for example, language standardization, development of teaching and learning materials in new languages, etc.) or recurring costs that may already be accounted for in the overall education sector budget (such as materials distribution, teacher training, etc.).

It is important to emphasize to stakeholders that many costs associated with developing and implementing a new plan for language use in education will be one-time expenses and that they will be recovered through less “wastage” (i.e., poor learning outcomes and dropout) resulting from effective use of language in education. Moreover, a large proportion of the cost of many of these one-off activities is the time needed for government personnel to participate in the planning and development of the language plan and products. Once these one-time expenses have been incurred, the education sector's large fixed costs—teacher salaries, infrastructure and replenishment of materials—are not likely to be affected by a plan for language use in education. It is important to remember that cost, in and of itself, should not be viewed as a barrier to providing instruction in languages that children understand, given the long-term benefits to learning outcomes and to the cost-effectiveness of education provision. As noted in a recent UNICEF publication on language policy in Eastern and Southern Africa, the question is not “How can we afford local language-based education?”, but rather **“How can we afford to keep running education systems that are designed to fail, by virtue of the language medium they use?”**

¹¹⁴ Heugh, Benson, Bogale, and Yohannes, 2007.

¹¹⁵ Tove Skutnabb-Kangas and Kathleen Heugh, eds. *Multilingual Education and Sustainable Diversity Work from Periphery to Centre*. London, UK: Routledge, 2012.

¹¹⁶ Pflepsen et al., 2016.

¹¹⁷ Rosalina Villaneza. *Roadmap for MTB-MLE Program in the Philippines* (PowerPoint slides). (Manila: MTB-MLE Program, Philippines Department of Education, 2014).

¹¹⁸ The forthcoming publication will be available at <http://www.adeanet.org>.

Developing and implementing an effective plan for improving reading instruction (and potentially for language use in education more broadly) is a long-term endeavor that can be accomplished with thoughtful planning to ensure alignment of all aspects of education provision. While many changes can take place quickly—as many primary grade reading programs have realized—education authorities, donors, and those who implement programs need to take a long-term view. The benefits of a long-term approach—improved education access, learning outcomes, equity and inclusion, and cost-efficiency—outweigh the cost of doing nothing. This investment is well worth the reward of quality education for all.



Stop and reflect: Policies, standards and plans

Activity 10: This activity provides an opportunity for individuals and/or program teams to review policies, standards and plans related to reading and language. The purpose of this activity is to identify where the development or modification of policies, standards and plans would be helpful to support expansion and sustainability of effective reading programming and language use.

1. Do language-specific standards, benchmarks and targets exist for the required languages in the context(s) where you are working? ☐ yes ☐ no

If yes, did they take into consideration the Global Proficiency Framework and USAID's guidance on benchmark development? ☐ yes ☐ no

If no, or if the standards and benchmarks are not aligned with the Global Proficiency Framework and USAID, what opportunities exist to align them?

2. What policies in your context could be improved to support evidence-based approaches to language use in education? Consider policies related to the language of instruction used in schools, teacher professional development, and teacher school placement.

3. How could your reading improvement initiative lead efforts to improve policies and plans related to reading instruction and language use in education?

4. Key takeaways on language, literacy and learning

Improving reading instruction and children's literacy outcomes requires a comprehensive understanding of how language affects education access, quality and equity. This resource describes language-related issues and steps to take to develop an evidence-based, effective approach to improving reading instruction, as well teaching and learning across the curriculum. Key ideas to inform literacy and education programming are as follows:

- **Language has a profound impact on education access, quality and equity.** USAID, through its 2018 Education Policy, and the global community (via the Sustainable Development Goals) are committed to improving educational *opportunities and outcomes for all*. Evidence-based, contextually appropriate approaches to language use to support literacy and learning have tremendous potential to help children and youth—in both stable and conflict- and crisis-affected environments—to acquire the literacy and other skills they need to improve their health and well-being, as well as that of their families, communities and countries. Experience has shown that reading improvement initiatives present a critical opportunity to “open the door” on language issues and to engage with stakeholders to collaboratively develop an approach to language of instruction that best supports effective, equitable learning outcomes.
- **Language issues are literacy issues.** Literacy cannot be separated from language. Language permeates all aspects of efforts to improve reading, as well as to improve education more broadly—from the instructional approach and materials used to teacher professional development and policies across the sector. Everyone involved in literacy programs needs to understand how language issues are relevant across program components. So, too, do those working to improve education access and outcomes for children and youth affected by conflict and crisis.
- **Language-related information gathering, analysis and planning is a critically important investment.** Situational analyses, language mapping, orthography analysis and standardization, research on language and dialect, and assessment of teachers' and students' language skills are just some of the key activities that need to be conducted to inform the design of a successful literacy improvement initiative. If a program is already underway, these and other activities are still important to undertake to help understand if an approach is leading to equitable, meaningful outcomes, to identify how an approach and activities can be improved, and to guide program expansion and sustainability.
- **Addressing language issues is possible—if we dedicate ourselves to it.** Addressing language-related issues can seem unrealistic, particularly in contexts where change has previously proved elusive, and within the parameters of a donor-funded project. But recent experiences from Afghanistan to Ghana to the Philippines have demonstrated that much can be done even in a short amount of time. Indeed, as the many examples from practice in this resource demonstrate, reading programs have made significant progress in understanding and addressing language issues in ways that were once thought unnecessary or unrealistic. Thoughtful, collaborative planning on how to address language issues throughout and across the education sector should be a priority.
- **There's something everyone and every program can do.** Even reading programs that have been successful in improving instruction and outcomes can improve how language issues are addressed, whether that means

developing reading standards for specific languages that are aligned with the Global Proficiency Framework, working to improve teachers' language skills and their ability to teach specific languages, or conducting language-specific research to inform changes in policy and practice. Even in contexts where language of instruction policy, practice and attitudes have seemed firmly rooted, a combination of evidence and advocacy have shown that change is possible in a relatively short amount of time, as has been the case in Mozambique.

Experience to date suggests the following actions are needed across programs and contexts to improve how language is addressed in reading programs:

- **Improve analysis and understanding of the sociolinguistic context.** For many years, programs often relied on outdated information and assumptions about what languages were spoken in specific areas and stakeholder knowledge, attitudes and beliefs about language. While some countries have dedicated resources to better understanding the sociolinguistic context, much work remains to be done across programs. Language mapping focused on children's expressive language skills, "teacher-student language match," and dialect are areas programs are encouraged to explore and to apply findings.
- **Better integrate language into plans for monitoring, evaluation, research and learning.** Experience has found that language issues need to be more holistically and comprehensively incorporated into MERL. Planning for fidelity of implementation monitoring, assessing children's and teachers' language proficiency, and disaggregating and analyzing outcomes by language and other key demographic characteristics are just some a few ways in which MERL can be enhanced to better understand language-related issues and their impact on learning outcomes across different populations.
- **Develop language-specific, globally comparable literacy standards and benchmarks.** The Global Proficiency Framework for reading and mathematics in grades 2-6, developed by UNESCO, USAID and other global partners, presents an opportunity for countries to identify (or update existing) standards. These standards will be useful locally as well as for reporting progress on Sustainable Development Goal 4.1.1. USAID-supported reading programs are also encouraged to support the identification of language-specific benchmarks using a policy linking approach.
- **Conduct research on language and literacy acquisition in multilingual contexts.** Much more remains to be learned about children's literacy acquisition in specific languages and contexts. Longitudinal data on children's reading proficiency and language skills is greatly needed to understand learners' trajectories over time. USAID's Foundational Skills Learning Agenda presents an opportunity for stakeholders to align their efforts around key questions critical to developing evidence-based instructional approaches.
- **Support and advocate for evidence-based, contextually appropriate policies, plans and practices related to language.** Literacy programs are uniquely positioned to improve language-related aspects of education policies, plans and practices across the education sector. Those related to teacher school assignment, teacher professional development, and the languages used for instruction are particularly important to address to support successful, long-term implementation of effective approaches. Advocacy, communication and collaboration among stakeholders are critical to making change happen.

Investments in these areas and others outlined in this resource have the potential to greatly improve education access, quality and equity for millions of children worldwide.

References

Note: Resources available at the Global Reading Network's website at the time of publication will be moved to USAID's EducationLinks website (www.edu-links.org) in 2020.

Association for the Development of Education in Africa (ADEA) and UNESCO Institute for Lifelong Learning (UIL). "Policy Guide on the Integration of African Languages and Cultures into Education Systems." UNESCO and ADEA, 2010. http://uil.unesco.org/fileadmin/keydocuments/Africa/en/policy_guide_sep_web_en.pdf.

Abu-Rabia, Salim, and Linda S. Siegel. "Reading, Syntactic, Orthographic, and Working Memory Skills of Bilingual Arabic-English Speaking Canadian Children." *Journal of Psycholinguistic Research* 31, no. 6 (2002): 661–78. <http://dx.doi.org/10.1023/a:1021221206119>.

Alesina, Alberto, Arnaud Devleeschauwer, William Easterly, Serio Kurlat, and Romain Wacziarg. "Fractionalization." *Journal of Economic Growth* 8, no. 2 (2003): 155–94. <http://dx.doi.org/10.1023/A:1024471506938>; http://dash.harvard.edu/bitstream/handle/1/4553003/alesinassrn_fractionalization.pdf?sequence=2.

Alexander, Neville, and Brigitta Busch, eds. *Literacy and Linguistic Diversity in a Global Perspective: An Intercultural Exchange with African Countries*. Strasbourg, France: European Center for Modern Languages, Council of Europe, 2007. http://archive.ecml.at/mtp2/publications/A3_LDL_E_internet.pdf.

Alidou, H., A. Batiana, A. Damiba, A. Pare, and E. Kinda, *Le continuum d'éducation de base multilingue du Burkina Faso: Une réponse aux exigences de l'éducation de qualité. Evaluation prospective du programme de consolidation de l'éducation bilingue et plan d'action stratégique opérationnel 2008–2010* (The Multilingual Basic Education Continuum of Burkina Faso: A Response to the Quality-of-Education Requirements. Prospective Evaluation of the Program for Strengthening the Bilingual Education Program and the Operations Strategic Action Plan for 2008–2010). Rapport d'étude. Ouagadougou, Burkina Faso: Ministère de l'Enseignement de Base et de l'Alphabétisation (Ministry of Basic Education and Literacy) (MEBA). 2008.

Alidou, Hassana, and Birgit Brock-Utne. "Teaching Practices: Teaching in a Familiar Language." In *Optimising Learning, Education and Publishing in Africa: The Language Factor*, edited by Adama Ouane and Christine Glanz, 159–185. Hamburg, Germany: UNESCO Institute for Lifelong Learning (UIL); and Tunis Belvédère, Tunisia: Association for the Development of Education in Africa (ADEA), 2011. <http://unesdoc.unesco.org/images/0021/002126/212602e.pdf>.

American Institutes for Research (AIR). *Are Latin American Children's Reading Skills Improving? Highlights of the Second and Third Regional Comparative and Explanatory Studies (SERCE & TERCE)*. Washington, D.C.: American Institutes for Research, 2015. https://lacreads.org/sites/default/files/documents/terce_2015.pdf.

Anteneh, Getachew, and Jekale, Derib Ado. "Language Policy in Ethiopia: History and Current Trends." *Ethiopia Journal of Education and Society* 2, no. 1 (September 2006): 37–60. https://www.researchgate.net/publication/330729191_Language_Policy_in_Ethiopia_History_and_Current_Trends.

Abu-Rabia, Salim, and Linda S. Siegel. "Reading, Syntactic, Orthographic, and Working Memory Skills of Bilingual Arabic-English Speaking Canadian Children." *Journal of Psycholinguistic Research* 31, no. 6 (November 2002): 661–78.

- Aro, Mikko. "Learning to Read: The Effect of Orthography" (dissertation). University of Jyväskylä, Finland, 2004.
http://www.researchgate.net/profile/Mikko_Aro/publication/230735268_Learning_to_Read_The_effect_of_orthography/links/0046352208679ba4ee000000.
- August, Diane, and Timothy Shanahan, eds. "Executive Summary: Developing Literacy in Second-Language Learners: Report of the National Literacy Panel on Language-Minority Children and Youth." In *Report of the National Literacy Panel on Language-Minority Children and Youth*. London: Lawrence Erlbaum Associates, Inc., 2006.
http://www.standardsinstitutes.org/sites/default/files/material/developing-literacy-in-second-language-learners-executive-summary_2.pdf.
- Ball, Jessica. *Enhancing Learning of Children from Diverse Language Backgrounds: Mother Tongue-Based Bilingual or Multilingual Education in the Early Years*. Paris, France: United Nations Educational, Scientific and Cultural Organization (UNESCO), 2011. <http://unesdoc.unesco.org/images/0021/002122/212270e.pdf>.
- Bamgbose, Ayo. "Language and Literacy Issues in Africa." In *Literacy and Linguistic Diversity in a Global Perspective: An Intercultural Exchange with African Countries*, edited by Alexander Neville and Brigitta Busch, 23–30. Strasbourg, France: European Center for Modern Languages, Council of Europe, 2007.
http://archive.ecml.at/mtp2/publications/A3_LDL_E_internet.pdf.
- Benson, Carol. "Trilingualism in Guinea-Bissau and the Question of Instructional Language." In *Trilingualism in Family, School and Community*, edited by Charlotte Hoffmann and Jehannes Ytsma, 166–84. Clevedon, UK: Multilingual Matters, 2003. <https://doi.org/10.21832/9781853596940-009>.
- Benson, Carol. "Bilingual Schooling in Mozambique and Bolivia: From Experimentation to Implementation." *Language Policy* 3, no. 1 (2004): 47–66. <https://doi.org/10.1023/b:lpol.0000017725.62093.66>.
- Benson, Carol. *Girls, Educational Equity and Mother Tongue-based Teaching*. Bangkok, Thailand: UNESCO, 2005.
<http://unesdoc.unesco.org/images/0014/001420/142049e.pdf>.
- Benson, Carol. "The Role of Language of Instruction in Promoting Quality and Equity in Primary Education." In *Lessons in Educational Equality: Successful Approaches to Intractable Problems Around the World*, edited by Jody Heymann and Adele Cassola, 199–215. New York: Oxford University Press, 2012.
<https://doi.org/10.1093/acprof:oso/9780199755011.003.0009>.
- Benson, Carol and Catherine Young. "How Can MTB-MLE be Carried Out in Classrooms Where Three or More Local Languages are Represented as Mother Tongues?" In *Good Answers to Tough Questions in Mother Tongue-Based Multilingual Education*, edited by Barbara Trudell and Catherine Young, 8–14. SIL International, 2016.
<https://www.sil.org/literacy-education/good-answers-tough-questions-mother-tongue-based-multilingual-education>.
- Bialystok, Ellen. "Metalinguistic Dimensions of Bilingual Language Proficiency." In *Language Processing in Bilingual Children*, 113–40. Cambridge, UK: Cambridge University Press, 1991. <https://doi.org/10.1017/cbo9780511620652.008>.
- Bialystok, Ellen. *Bilingualism in Development: Language, Literacy and Cognition*. Cambridge, UK: Cambridge University Press, 2006. <https://doi.org/10.1017/CBO9780511605963>.
- Bialystok, Ellen. "Acquisition of Literacy in Bilingual Children: A Framework for Research." *Language Learning* 57: 45–77 (2007). <https://doi.org/10.1111/j.1467-9922.2007.00412.x>.

- Bialystok, Ellen. "Reshaping the Mind: The Benefits of Bilingualism." *Canadian Journal of Experimental Psychology/Revue Canadienne De Psychologie Expérimentale* 65, no.4 (2011): 229–35. <https://doi.org/10.1037/a0025406>.
- Bialystok, Ellen, Catherine McBride-Chang, and Gigi Luk. "Bilingualism, Language Proficiency, and Learning to Read in Two Writing Systems." *Journal of Educational Psychology* 97, no. 4 (2005): 580–90. <https://doi.org/10.1037/0022-0663.97.4.580>.
- Bialystok, Ellen, Gigi Luk, and Ernest Kwan. "Bilingualism, Biliteracy, and Learning to Read: Interactions Among Languages and Writing Systems." *Scientific Studies of Reading* 9, no. 1 (2005): 43-61.
- Blankenbeckler, Corrie. "More than Stories: Developing Decodable and Leveled Texts in Mozambique." Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, March 2018. <https://www.globalreadingnetwork.net/resources/developing-effective-and-appropriate-decodable-and-leveled-books>.
- Bloch, Carole. "Putting Little Books into Little Hands in the Year of African Languages: A Stories Across Africa Project Initiative." In *Literacy and Linguistic Diversity in a Global Perspective: An Intercultural Exchange with African Countries*, edited by Alexander Neville and Brigitta Busch, 49–62. Strasbourg, France: European Center for Modern Languages, Council of Europe, 2007. http://archive.ecml.at/mtp2/publications/A3_LDL_E_internet.pdf.
- Boakye-Yiadom, F., Mackenzie Matthews, Emily Miksic, and Barbara Trudell. *Developing Early Grade Reading Materials in 11 Languages: Learning in Ghana*. Panel of four presentations at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, March 2018. <https://globalreadingnetwork.net/resources/developing-early-grade-reading-materials-11-languages-learning-ghana>.
- Bruckner, Susan, Dina Ocampo, Wendi Ralaingita, and Jhum Rai. *Language Policy, Planning and Practice in Reading Programs*. Global Reading Network webinar, March 7, 2018. <https://www.globalreadingnetwork.net/resources/webinar-language-policy-planning-and-practice-egr-programs>.
- Bulat, Jennae, et al. *What We Have Learned in the Past Decade: RTI's Approach to Early Grade Literacy Instruction*. RTI Press Publication No. OP-0039-1702. Research Triangle Park, NC: RTI Press, 2017. <http://shared.rti.org/content/what-we-have-learned-past-decade-rtis-approach-early-grade-literacy-instruction>.
- Bunyi, Grace, Isaac Cherotich, and Benjamin Piper. *Primary Math and Reading (PRIMR) Program: Kenya Education Policy Study Report*. Prepared for USAID under the Education Data for Decision Making (EdData II) project, Task Order No. AID-623-M-11-00001 (RTI Task 13). Research Triangle Park, NC: RTI International, 2012. http://pdf.usaid.gov/pdf_docs/pa00hx76.pdf.
- Calero-Breckheimer, Ayxa, and Ernest Timothy Goetz. "Reading Strategies of Biliterate Children for English and Spanish Texts." *Reading Psychology* 14, no. 3 (1993):177-204. doi: [10.1080/027027193140301](https://doi.org/10.1080/027027193140301).
- Carson, Kaitlin, Jamie McPike, Kevin Kamto, Adria Molotsky, and Pooja Nakamura. *Development and Evaluation of the Lao Child Literacy Development (CLD) Pilot*. Washington, D.C.: American Institutes for Research and Catholic Relief Services (CRS), 2018. www.globalreadingnetwork.net.

- Casely-Hayford, Leslie, and Adom Baisie Ghartey. *The Leap to Literacy and Life Change in Northern Ghana: An Impact Assessment of School for Life (SfL)*. Accra: School for Life, 2007.
http://www.web.net/~afc/download2/Education/complimentary_edu_abridged.pdf.
- Cenoz, Jasone. "The Influence of Age on the Acquisition of English: General Proficiency, Attitudes and Code Mixing." In *Age and the Acquisition of English as a Foreign Language*, edited by María del Pilar García Mayo and María Luisa García Lecumberri, 77–93. Clevedon, UK: Multilingual Matters, 2003. <https://doi.org/10.21832/9781853596407-005>.
- Cenoz, Jasone. "Towards Multilingual Education: Basque Educational Research from an International Perspective." Bristol, UK: Multilingual Matters, 2009. <https://doi.org/10.21832/9781847691941>.
- Center for Applied Linguistics (CAL). Executive summary. In *Developing Literacy in Second-Language Learners: Report of the National Literacy Panel on Language-Minority Children and Youth*, edited by Diane August and Timothy Shanahan, 4. Mahwah, NJ: Lawrence Erlbaum, 2006. <http://www.bilingualeducation.org/pdfs/PROP2272.pdf>.
- Chimbutane, Feliciano. "Rethinking Bilingual Education in Postcolonial Contexts." Bristol, UK: Multilingual Matters, 2011.
- Cisero, Cheryl A., and James M. Royer. "The Development and Cross-Language Transfer of Phonological Awareness." *Contemporary Educational Psychology* 20, no. 3 (2005): 275–303.
<https://doi.org/10.1006/ceps.1995.1018>.
- Coyne, Gary. "Language Education Policies and Inequality in Africa: Cross-National Empirical Evidence." *Comparative Education Review* 59, no. 4 (2015): 619–637.
- Cozzolino, Sofia, and Cable Green (2019). *Open Licensing of Primary Grade Reading Materials: Considerations and Recommendations*. A Global Reading Network Resource. Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative. Chevy Chase, MD: URC. www.edu-links.org.
- Creative Associates International. *READ II: Annual Report, October 2018-September 2019*. Prepared for USAID/Ethiopia under Cooperative Agreement No. AID 72066318CA00004, READ II Activity. Washington, D.C. Creative Associates International, 2019.
- Creative Associates. *Introduction to Teaching Early Grade Reading in P1-P3* (student teacher resource book). Abuja, Nigeria: National Commission for Colleges of Education. No date. https://pdf.usaid.gov/pdf_docs/PA00TCCH.pdf.
- Cummins, Jim. *Bilingual Education and Special Education: Issues in Assessment and Pedagogy*. Clevedon, UK: Multilingual Matters, 1984.
- Cummins, Jim. "Interdependence of First- and Second-Language Proficiency in Bilingual Children." In *Language Processing in Bilingual Children*, edited by Ellen Bialystock, 70–89. Cambridge, UK: Cambridge University Press, 1991.
<https://doi.org/10.1017/cbo9780511620652.006>.
- Cummins, Jim. "Fundamental Psycholinguistic and Sociological Principles Underlying Educational Success for Linguistic Minority Students." In *Social Justice through Multilingual Education*, edited by Tove Skutnabb-Kangas, Robert Phillipson, Ajit K. Mohanty, and Minata Panda, 19–35. Bristol, UK: Multilingual Matters, 2009.
<https://doi.org/10.21832/9781847691910-005>.

- Cummins, Jim. "The Intersection of Cognitive and Sociocultural Factors in the Development of Reading Comprehension among Immigrant Students." *Reading and Writing* 25, no.8 (2011): 1973–90. <https://doi.org/10.1007/s11145-010-9290-7>.
- Cummins, Jim, Birgit Harley, Merrill Swain, and Patrick Allen. "Social and Individual Factors in the Development of Bilingual Proficiency." In *The Development of Second Language Proficiency*, 119–33. Cambridge, UK: Cambridge University Press, 1990. <https://doi.org/10.1017/cbo9781139524568.011>.
- Cummins, Jim, Merrill Swain, Kazuko Nakajima, Jean Handscombe, Daina Green, and Chau Tran. "Linguistic Interdependence Among Japanese Immigrant Students." In *Communicative Competence Approaches to Language Proficiency Assessment: Research and Application*, edited by Charlene Rivera, 60–81. Clevedon, UK: Multilingual Matters, 1984.
- Denton, Carolyn A., and Jan E. Hasbrouck. "What Do We Know About Phonological Awareness in Spanish?" *Reading Psychology* 21, no. 4 (2000): 335–52. <https://doi.org/10.1080/027027100750061958>.
- DeStefano, Joseph, and F. Henry Healey. *Scale-up of Early Grade Reading Programs*. Research Triangle Park: RTI International, 2016. <https://globalreadingnetwork.net/eddata/task-order-15-data-education-programming-asia-and-middle-east-depame-scale-early-grade>.
- Durgunoğlu, Aydin Yücesan. "Cross-Linguistic Transfer in Literacy Development and Implications for Language Learners." *Annals of Dyslexia* 52, no. 1 (2002): 189–204. <https://doi.org/10.1007/s11881-002-0012-y>.
- Durgunoğlu, Aydin Yücesan, William E. Nagy, and Barbara J. Hancin-Bhatt. "Cross language transfer of phonological awareness." *Journal of Educational Psychology* 85 (1993): 453–465.
- Dubeck, Margaret. "Multi-Language Assessment (MLA) for Young Children: An Instrument in Development by RTI International" (blog). March 10, 2019. <https://shared.rti.org/content/multi-language-assessment-mla-young-children-instrument-development-rti-international>.
- Easterly, William. *Can Institutions Resolve Ethnic Conflict?* Washington, D.C.: World Bank. http://www-wds.worldbank.org/servlet/WDSCContentServer/WDSP/IB/2000/12/15/000094946_00111805313095/Rendered/PDF/multi_page.pdf.
- Eberhard, David M., Gary F. Simons, and Charles D. Fennig, eds. *Ethnologue: Languages of the World*. Twenty-second edition. Dallas, Texas: SIL International, 2019. <http://www.ethnologue.com/>.
- EdQual. "Language of Instruction and Quality of Learning in Tanzania and Ghana: The Impact of Language of Instruction, Teacher Training and Textbooks on Quality of Learning in Africa." EdQual Policy Brief No. 2. Bristol, UK: EdQual Research Programme Consortium, September 2010. <http://www.edqual.org/publications/policy-briefs/pb2.pdf>.
- Education Above All. *Conflict-Sensitive Education Policy: A Preliminary Review*. Doha, Qatar: Education Above All, 2012. http://protectingeducation.org/sites/default/files/documents/eaal_conflict_sensitive_education_policy.pdf.
- Education Development Center, Inc. (EDC). *Mother Tongue-Based Multilingual Education in the Philippines: A Study of Literacy Trajectories*. 2017. Retrieved from https://pdf.usaid.gov/pdf_docs/PA00T717.pdf.

- Florida Center for Reading Research (FCRR) Curriculum Review Team. *Frequently Asked Questions About Reading Instruction*. Tallahassee, FL: FCRR, 2009. <http://www.fcrr.org/curriculum/curriculumInstructionFaq1.shtm#4>.
- FHI 360. Education Program for USAID/Madagascar “Mahay Mamaky Teny!”. Final report. Washington, D.C.: FHI 360, 2018. https://pdf.usaid.gov/pdf_docs/PA00TBW1.pdf.
- FHI 360. Ghana *Learning Language Mapping Study: Analysis Report*. FHI 360: Washington, D.C.: FHI 360, 2018. https://pdf.usaid.gov/pdf_docs/PA00T4QS.pdf.
- Florida State University and Creative Associates, *Literacy Skills in the Primary School: A Graduate Certificate Course for Teacher Educators, Researchers and National Stakeholders*. Available in “Continuous Professional Development in EGR Programs” (GRN webinar); see Handout 5. <https://www.globalreadingnetwork.net/resources/continuous-professional-development-early-grade-reading-programs>
- Garcia, Ofelia. “Bilingual Education in the 21st Century: A Global Perspective.” *Applied Linguistics* 32, no. 4 (2011): 456–58. <https://doi.org/10.1093/applin/amr024>.
- Genesee, Fred, and Esther Geva. “Cross-linguistic Relationships in Working Memory, Phonological Processes, and Oral Language.” In *Developing Literacy in Second-Language Learners: Report of the National Literacy Panel on Language-Minority Children and Youth*, edited by Diane August and Timothy Shanahan, 175–183. Mahwah, NJ: Lawrence Erlbaum Associates, 2006.
- Geva, Esther. “Learning to Read in a Second Language: Research, Implications, and Recommendations for Services.” In *Encyclopedia on Early Childhood Development*, edited by R. E. Tremblay, R. G. Barr, and R. DeV. Peters. Montreal, Quebec: Centre of Excellence for Early Childhood Development, 2006. <http://www.child-encyclopedia.com/sites/default/files/textes-experts/en/614/learning-to-read-in-a-second-language-research-implications-and-recommendations-for-services.pdf>.
- Geva, Esther, and Zohreh Yaghoub. “Efficiency in Native English Speaking and English-as-a-Second-Language Children: The Role of Oral Proficiency and Underlying Cognitive-Linguistic Processes.” *Scientific Studies of Reading* 10, no. 1 (2006): 31-57.
- Global Reading Network. “Early Grade Reading Benchmarks: Methods, Experiences and Future Directions” (webinar), June 27, 2018. <https://www.globalreadingnetwork.net/resources/early-grade-reading-benchmarks-methods-experiences-and-future-directions>.
- Global Reading Network. *Track and Trace Models Facilitating Book Distribution and More Access*. Panel presentation at the annual conference of the Comparative and International Education Society (CIES), San Francisco, CA, April 2019. <https://www.globalreadingnetwork.net/resources/track-and-trace-models-facilitating-book-distribution-and-more-access>.
- Global Reading Network. Enabling Writers Workshop Program. [web page]. Accessed November 15, 2019. <https://www.globalreadingnetwork.net/innovations-1>.
- Goldenberg, Claude. “Teaching English Language Learners: What the Research Does—and Does Not—Say.” *American Educator*, Summer (2008): 8–44. <https://www.aft.org/sites/default/files/periodicals/goldenberg.pdf>.

- Goldenberg, Claude. "Reading Instruction for English Language Learners." *Handbook of Reading Research* 4. 2011. <https://doi.org/10.4324/9780203840412.ch28>.
- Gottardo, Alexandra, Bernice Yan, Linda S. Siegel, and Lesly Wade-Woolley. "Factors Related to English Reading Performance in Children with Chinese as a First Language: More Evidence of Cross-Language Transfer of Phonological Processing." *Journal of Educational Psychology* 93, no. 3 (2001): 530–42. <https://doi.org/10.1037//0022-0663.93.3.530>.
- Gove, Amber, Audrey-Marie Moore, and Peggy McCardle (eds.). *Progress Toward a Literate World: Early Reading Interventions in Low- and Middle-Income Countries*. Special issue of *New Directions for Child and Adolescent Development* 155 (2007). <https://doi.org/10.1002/cad.2017.2017.issue-155>.
- Gove, Amber, and Peter Cvelich. *Early Reading: Igniting Education for All*. A report by the Early Grade Learning Community of Practice (Revised Edition). Research Triangle Park, NC: RTI International, 2011. <http://shared.rti.org/content/early-reading-igniting-education-all-report-early-grade-learning-community-practice>.
- Grin, F. The Economics of Language Policy Implementation: Identifying and Measuring Costs. In *Mother Tongue-Based Bilingual Education in Southern Africa: The Dynamics of Implementation*, edited by Neville Alexander, 11–25. Cape Town, South Africa: The Project for the Study of Alternative Education in South Africa (PRAESA), 2005.
- Haiyan Hua, David Noyes, Willem van de Waal, and Adam Turney. *Vamos Ler! Quantitative Study of Teacher Knowledge, Attitudes, & Practices (KAP) in Mozambique: Final Report*. World Education, Inc., Creative Associates International, USAID Mission to Mozambique, 2017. https://pdf.usaid.gov/pdf_docs/PA00N7SG.pdf.
- Healey, F. Henry, Emily Morris, and Emily Kochetkova. *Literacy Landscape Assessment Toolkit*. Prepared by University Research Co., LLC (URC) under the Reading within Reach (REACH) initiative for USAID's Building Evidence and Supporting Innovation to Improve Primary Grade Assistance for the Office of Education (E3/ED). Chevy Chase, MD: URC, 2019. www.edu-links.org.
- HEART. *Independent Verification of Educational Data for a Pilot of Results-Based Aid (RBA) in Rwanda*. Baseline report. March 2013. <https://assets.publishing.service.gov.uk/media/57a08a2ded915d622c0005d1/Rwanda-Baseline-Report-education-data.pdf>.
- Hertz, Ashley C., Emily Kochetkova, and Alison Pflepsen. *Classroom Observation Toolkit for Early Grade Reading Improvement*. A Global Reading Network Resource. Prepared by University Research Co., LLC. (URC) under the Reading within REACH initiative for USAID's Building Evidence and Supporting Innovation to Improve Primary Grade Assistance for the Office of Education (E3/ED). Chevy Chase, MD: URC, 2019. www.edu-links.org.
- Heugh, Kathleen. "Cost Implications of the Provision of Mother-tongue and Strong Bilingual Models of Education in Africa." In *Optimising Learning, Education and Publishing in Africa: The Language Factor*, edited by Adama Ouane and Christine Glanz, 255–289. Hamburg, Germany: UNESCO Institute for Lifelong Learning (UIL); and Tunis Belvédère, Tunisia: ADEA, 2011. <http://unesdoc.unesco.org/images/0021/002126/212602e.pdf>.
- Heugh, Kathleen, Carol Benson, Berhanu Bogale, and Mekonnen Alemu Gebre Yohannes. *Final Report: Study on Medium of Instruction in Primary Schools in Ethiopia*. Addis Ababa: Ministry of Education, 2007. <http://www.hsrc.ac.za/en/research-outputs/view/2926>.

- Hovens, Mart. "Bilingual Education in West Africa: Does it Work?" *International Journal of Bilingual Education and Bilingualism*, 5, no. 5 (2002): 249–266. <http://dx.doi.org/10.1080/13670050208667760>.
- Hovens, Mart. *Enseignement Primaire Bilingue: Deux Expériences Ouest-Africaines (Primary Bilingual Instruction: Two West African Experiences)*. Niamey, Niger: Albasa, 2003.
- Howard, Elizabeth R., Julie Sugarman, Donna Christian, Kathryn J. Lindholm-Leary, and David Rogers. *Guiding Principles for Dual Language Education* (2nd ed.). Washington, D.C.: Center for Applied Linguistics, 2007. http://www.cal.org/twi/Guiding_Principles.pdf.
- Hungi, Njora. 2011. "Accounting for Variations in the Quality of Primary School Education." SACMEQ Working Paper 7. Paris, France: UNESCO International Institute for Educational Planning. http://www.sacmeq.org/sites/default/files/sacmeq/publications/07_multivariate_final.pdf.
- International Literacy Association (ILA). *Literacy Glossary*. No date. <https://www.literacyworldwide.org/get-resources/literacy-glossary>.
- Kim, Young-Suk, Helen Boyle, Stephanie Simmons Zuilkowski, and Pooja Nakamura. *Landscape Report on Early Grade Literacy*. A Global Reading Network Resource. Prepared by University Research Co., LLC (URC) under the Reading within REACH initiative for USAID's Building Evidence and Supporting Innovation to Improve Primary Grade Assistance for the Office of Education (E3/ED). Chevy Chase, MD: URC, 2017. <https://www.edu-links.org/resources/landscape-report-early-grade-literacy>.
- Kim, Young-Suk and Marcia Davidson. *Assessment to Inform Instruction: Formative Assessment*. GRN Critical Topics Series. Prepared by University Research Co., LLC (URC) under the Reading within Reach (REACH) initiative for USAID's Building Evidence and Supporting Innovation to Improve Primary Grade Assistance for the Office of Education (E3/ED). Chevy Chase, MD: URC, 2019. www.edu-links.org.
- Kosonen, Kimmo. *Language of Instruction in Southeast Asia*. Background paper prepared for the 2017/8 Global Education Monitoring Report. UNESCO, 2017. <http://unesdoc.unesco.org/images/0025/002595/259576e.pdf>.
- Kosonen, Kimmo, Catherine Young, and Susan Malone. *Promoting Literacy in Multilingual settings*. Bangkok, Thailand: UNESCO, 2007. <https://www.sil.org/literacy-and-education/promoting-literacy-multilingual-settings-0>.
- Kraft, Matthew A., David Blazar and Dylan Hogan. "The Effect of Teaching Coaching on Instruction and Achievement: A Meta-Analysis of the Causal Evidence." *Review of Educational Research* 88, no. 4 (2018): 547-588. doi: 10.3102/0034654318759268
- LAC Reads Capacity Program. *Early Grade Reading in Latin America and the Caribbean: A Systematic Review*. Washington, D.C.: USAID, December 2016. <https://lacreads.org/sites/default/files/evidence/lrcp-systematic-rvw-rpt-508.pdf>.
- Leafstedt, Jill and Michael M. Gerber. "Crossover of Phonological Processing Skills: A Study of Spanish-Speaking Students in Two Instructional Settings." *Remedial and Special Education* 26, no. 4 (August 2005): 226-235. doi: [10.1177/07419325050260040501](https://doi.org/10.1177/07419325050260040501).
- Leipzig, Diane Henry. "What is Reading?" Reading Rockets. No date. <https://www.readingrockets.org/article/what-reading>.

- Maldonado, Sophia, and Leslie Rosales. *Learning to Read... Expected and Actual Trajectories. A Longitudinal Study of Children in Guatemala*. Lifelong Learning Policy Brief No. 2. USAID/Guatemala: Lifelong Learning Project, 2018. <http://usaidlea.org/images/1. Resumenes de politicas educativas 2018 -ingle s-.pdf>.
- Malone, Susan. *Planning Mother Tongue-Based Education Programs in Minority Language Communities*. Asia Area: SIL International, 2010. http://www.sil.org/system/files/reapdata/70/48/16/7048166307607336995392351528290448531/MLE_Program_Planning_manual.pdf.
- Malone, Susan. *Teaching and Learning Materials for Language Education: KG1 to Grade 6*. Dallas, TX: SIL International, 2012. http://www.sil.org/sites/default/files/files/materials_for_language_education.pdf.
- Malone, Susan, and Patricia Paraide. "Mother Tongue-Based Bilingual Education in Papua New Guinea." *International Review of Education* 57 no. 5-6 (2011): 705–20. <https://doi.org/10.1007/s11159-011-9256-2>.
- Martin, Michael O., Ina V. S. Mullis, and Pierre Foye. "Students' Backgrounds and Attitudes Towards Science." *TIMSS 2007 International Science Report: Findings from IEA's Trends in International Mathematics and Science Study at the Fourth and Eighth Grades* (Chapter 4). Chestnut Hill, MA: TIMSS & PIRLS International Study Center, Boston College, 2008. <https://timss.bc.edu/TIMSS2007/sciencereport.html>.
- Mattos, Monika, and Yasmin Sitabkhan. *Malawi Early Grade Reading Activity: Scripting Study Report*. Research Triangle Park, NC: RTI International, 2016. <http://shared.rti.org/content/malawi-early-grade-reading-activity-scripting-study-report-presentation>.
- Montoya, Silvia. *Defining Literacy*. Presentation at the GAML Fifth Meeting, Hamburg, Germany: UNESCO, 2018. http://gaml.uis.unesco.org/wp-content/uploads/sites/2/2018/12/4.6.1_07_4.6-defining-literacy.pdf.
- "Moroccan Sign Language Assistive Technology for Reading Improvement of Children who are Deaf/Hard of Hearing." *All Children Reading: A Grand Challenge for Development*. Accessed 9 November 2019.
- Mozambique Ministry of Education and Human Development. *Estratégia de Expansão do Ensino Bilingue, 2020-2029*. Mozambique: Ministry of Education and Human Development, 2019.
- Mullis, Ina V. S., Michael O. Martin, Pierre Foy, and Kathleen T. Drucker. *The PIRLS 2011 International Results in Reading*. Chestnut Hill, MA: Trends in International Mathematics and Science Study (TIMSS) and Progress in International Reading Literacy Study (PIRLS), Boston College, 2012. <http://timssandpirls.bc.edu/pirls2011/international-results-pirls.html>.
- Nakamura, Pooja, and Thomas de Hoop. *Facilitating Reading Acquisition in Multilingual Environments in India (FRAME-India)* (final report). Washington, D.C.: American Institutes of Research (AIR), 2014. <https://www.air.org/resource/-reading-acquisition-multilingual-environments-india-frame-india-final-report>.
- Nakamura, Pooja, Kaitlin Carson, Dustin Davis, Nisha Rai, and Amy Todd. *Language Mapping Study in Mozambique*. Produced by the American Institutes for Research (AIR) for Creative Associates International, on behalf of the U.S. Agency for International Development (USAID). Washington, D.C.: AIR, 2018. Available at https://pdf.usaid.gov/pdf_docs/pa00n7sd.pdf.

- Nakamura, Pooja, Nisha Rai, Dustin Davis, Kaitlin Carson, and Corrie Blankenbeckler. "Are You Bilingual? Unpacking 'Language' in Language Mapping in Mozambique." Presentation at the annual conference of the Comparative and International Education Society (CIES). Mexico City, Mexico, 2019. <https://globalreadingnetwork.net/resources/are-you-bilingual-unpacking-language-language-mapping-mozambique>.
- Nation, I. "How Large a Vocabulary Is Needed for Reading and Listening?" *Canadian Modern Language Review* 63, no.1 (2006): 59–82. <https://doi.org/10.3138/cmlr.63.1.59>.
- Nation, Paul, and Karen Wang Ming-Tzu. "Graded Readers and Vocabulary." *Reading in a Foreign Language* 12, no. 2 (1999): 355–380.
- O'Gara, Chloe, and Kendall, Nancy. *Beyond Enrollment: A Handbook for Improving Girls' Experiences in Primary Classrooms*. Research conducted for the Advancing Basic Education and Literacy (ABEL2) consortium. Washington, D.C.: Creative Associates International, 1996.
- Ouane, Adama, and Christine Glanz. *Why and How Africa Should Invest in African Languages and Multilingual Education: An Evidence- and Practice-Based Policy Advocacy Brief*. Hamburg, Germany: UNESCO Institute for Lifelong Learning; and Tunis Belvédère, Tunisia: Association for the Development of Education in Africa (ADEA), 2010. <http://unesdoc.unesco.org/images/0018/001886/188642e.pdf>.
- Ouane, Adama, and Christine Glanz, eds. *Optimising Learning, Education and Publishing in Africa: The Language Factor. A Review and Analysis of Theory and Practice in Mother-Tongue and Bilingual Education in Sub-Saharan Africa*. Hamburg, Germany: UNESCO UIL; and Tunis Belvédère, Tunisia: ADEA, 2011. <http://unesdoc.unesco.org/images/0021/002126/212602e.pdf>.
- Pallangyo, Amy, and Alison Pflapsen. "Continuous Professional Development in Early Grade Reading Programs (webinar). In *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success* Training Series. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T. Chevy Chase, MD: URC, July 24, 2019. <https://www.globalreadingnetwork.net/resources/continuous-professional-development-early-grade-reading-programs>.
- Pallangyo, Amy, Alison Pflapsen, and Aristarick Lyimo. "Resources for Teaching and Learning Early Grade Reading" (webinar). In *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success* Training Series. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T. Chevy Chase, MD: URC, July 10, 2019. <https://www.globalreadingnetwork.net/resources/resources-teaching-and-learning-early-grade-reading>.
- Patrinos, Harry Anthony, and Eduardo Velez. "Costs and Benefits of Bilingual Education in Guatemala: A Partial Analysis." *International Journal of Educational Development* 29, no.6 (2009): 594–598. <http://dx.doi.org/10.1016/j.ijedudev.2009.02.001f>.
- Pflapsen, Alison, Carol Benson, Colette Chabbott, and Agatha J. van Ginkel. *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes*. Research Triangle Park, NC: RTI International, 2016. https://www.globalreadingnetwork.net/sites/default/files/eddata/Language_Use_in_Education_guidance_May_2016_FINAL.pdf.

- Pflepsen, Alison, and Adrienne Barnes. "Language Considerations in Early Grade Reading Programs" (webinar). In *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success* Training Series. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T. Chevy Chase, MD: URC, July 24, 2019. <https://www.globalreadingnetwork.net/resources/language-considerations-early-grade-reading-programs>.
- Philippines Department of Education. "Guidelines on the Early Language, Literacy and Numeracy Program: Professional Development Component." Manila, Philippines: Philippines Department of Education, 2015. <http://www.deped.gov.ph/orders/do-12-s-2015>.
- Pinnock, Helen. *Language and Education: The Missing Link. How the Language Used in Schools Threatens the Achievement of Education for All*. United Kingdom: CfBT Education Trust and Save the Children Alliance, 2009a. <http://www.unesco.org/education/EFAWG2009/LanguageEducation.pdf>.
- Pinnock, Helen. *Steps Towards Learning: A Guide to Overcoming Language Barriers in Children's Education*. London, UK: Save the Children, 2009b. <https://www.savethechildren.org.uk/content/dam/global/reports/steps-towards-learning-lr.pdf>.
- Pinnock, Helen. *Reflecting Language Diversity in Children's Schooling: Moving from "Why Multilingual Education" to "How?"* United Kingdom: CfBT Education Trust and Save the Children, 2011.
- Pinto, Christabel. "Negotiating Language Complexities and Government Policies for Khmer Instruction." Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, March 2018. <https://globalreadingnetwork.net/resources/negotiating-language-complexities-and-government-policies-khmer-instruction>.
- Pinto, Christabel. "The Missing Genre: Creating Quality Non-fiction Books for the Early Grades." Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, 2018. <https://globalreadingnetwork.net/resources/missing-genre-creating-quality-non-fiction-books-early-grades>.
- Piper, Benjamin, Leila Schroeder, and Trudell, Barbara. "Oral Reading Fluency and Comprehension in Kenya: Reading Acquisition in a Multilingual Environment," *Journal of Research in Reading* 39, no. 2 (2015): 133-152. <http://dx.doi.org/10.1111/1467-9817.12052>.
- Piper, Benjamin, Stephanie Simmons Zuilkowski, Dunston Kwayumba, and Arbogast Oyango. "Examining the Secondary Effects of Mother-Tongue Literacy Instruction in Kenya: Impacts on Student Learning in English, Kiswahili and Mathematics." *International Journal of Educational Development* 59 (2018): 110-127. <https://doi.org/10.1016/j.ijedudev.2017.10.002>.
- Pouzevara, Sarah, ed. *Cultivating Dynamic Educators: Case Studies in Teacher Behavior Change in Asia and Africa*. Research Triangle Park: RTI Press. <http://shared.rti.org/content/cultivating-dynamic-educators-case-studies-teacher-behavior-change-africa-and-asia>
- Ralaingita, Wendi. "Language Policy, Planning and Practice in EGR Programs in Ethiopia & Nepal." (webinar). Presentation delivered as part of *Language Policy, Planning and Practice*. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T. Chevy Chase, MD: URC, July 10, 2019. Global Reading Network webinar, March 7,

2018. <https://www.globalreadingnetwork.net/resources/webinar-language-policy-planning-and-practice-egr-programs>.

Ralaingita, Wendi, and Agatha J. van Ginkel, *Balancing Linguistic and Contextual Factors: Lessons Learned from Supporting Reading in Three Alpha-Syllabic Script Languages*. Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, March 2018.

<https://www.globalreadingnetwork.net/resources/balancing-linguistic-and-contextual-factors-lessons-learned-supporting-reading-three-alpha>.

Reaser, Jeffrey, Carolyn Temple Adger, Walter Wolfram, and Donna Christian. *Dialects at School: Educating Linguistically Diverse Students*. New York: Routledge, 2017.

Rhodes, Rebecca. "Moving Towards Bilingual education in Mali: Bridging Policy and Practice for Improved Reading Instruction." Presentation delivered on June 2012. www.globalreadingnetwork.net.

Robledo, Ana. *Developing and Producing Reading Materials*. Presentation at the annual conference of the Comparative and International Education Society (CIES), Washington, D.C., March 2015.

Rogan, James and Ashley Henderson. *Rapid Education and Risk Analysis Toolkit*. Washington, D.C.: USAID, 2018. <https://www.edu-links.org/resources/rapid-education-and-risk-analysis-rera-toolkit-1>.

Room to Read. "Data Driven Methods for Setting Reading Proficiency Benchmarks." San Francisco, CA: Room to Read, 2018. https://www.roomtoread.org/media/984466/room-to-read_fluency-benchmarking-analysis_report_may-2018.pdf.

Roth, Froma P., Deborah L. Speece, and David H. Cooper. "A Longitudinal Analysis of the Connection between Oral Language and Early Reading." *The Journal of Educational Research* 95, no. 5 (2002): 259-272. <https://doi.org/10.1080/00220670209596600>.

RTI International. *USAID/Uganda School Health and Reading Program, Annual Report, May 2012–September 2013*. Prepared for USAID under Cooperative Agreement No. AID-617-12-00002. Research Triangle Park, NC: RTI International, 2013a.

RTI International. *Reading for Ethiopia's Achievement Developed (READ) Technical Assistance: Annual Report, October 2012–June 2013*. Prepared for USAID/Ethiopia under Cooperative Agreement No. AID-663-A-12-00013. Research Triangle Park, NC: RTI International. 2013b.

RTI International. *Nigeria Reading and Access Research Activity: Review of Existing Reading Materials to Support Hausa Literacy Instruction*. Prepared for USAID under the EdData II project, Task Order No. AID-620-BC-14-00002 (RTI Task 26). Research Triangle Park, NC: RTI International, 2014a. http://pdf.usaid.gov/pdf_docs/PA00KM2M.pdf.

RTI International. *Reading for Ethiopia's Achievement Developed (READ) Technical Assistance: Annual Report, July 2013–June 2014*. Prepared for USAID/Ethiopia under Cooperative Agreement No. AID-663-A-12-00013. Research Triangle Park, NC: RTI International, 2014a.

- RTI International. *USAID/Kenya Primary Math and Reading (PRIMR) Initiative: Final report*. Prepared under the Education Data for Decision Making (EdData II) project, Task Order No. AID-623-M-11-00001, RTI Task 13. Research Triangle Park, North Carolina, USA: RTI International, 2014b. http://pdf.usaid.gov/pdf_docs/pa00k282.pdf.
- RTI International. *Nigeria Reading and Access Research Activity (RARA): Results of an Approach to Improve Early Grade Reading in Hausa in Bauchi and Sokoto States*. Prepared for USAID under the EdData II project, Task Order No. AID-620-BC-14-00002 (RTI Task 26). Research Triangle Park, NC: RTI International, 2016a. https://pdf.usaid.gov/pdf_docs/PA00KVM1.pdf.
- RTI International. *Development and Pilot Testing of Additional Subtasks for the Early Grade Reading Assessment: EGRA 2.0*. Research Triangle Park, NC: RTI International, 2016b. <http://shared.rti.org/content/development-and-pilot-testing-additional-subtasks-early-grade-reading-assessment-egra-20>.
- RTI International. *Endline Monitoring Report, Volume 3: An Assessment of Early Grade Reading. How Well Children Are Reading in USAID PRIORITAS Districts (Cohorts 1, 2, and 3)*. Research Triangle Park, NC: RTI, 2017. https://pdf.usaid.gov/pdf_docs/PA00N1N6.pdf.
- RTI International. *Results of Social and Behavior Change Communication Pilots in Senegal and Malawi* (brief). Research Triangle Park, NC: RTI International, no date. <http://shared.rti.org/content/results-social-and-behavior-change-communication-pilots-senegal-and-malawi>.
- Sampa, Francis. *Zambia's Primary Reading Programme (PRP): Improving Access and Quality Education in Basic Schools*. African Experiences Country Case Studies 4. Paper commissioned by ADEA for its Biennial Meeting, December 2005. http://www.adeanet.org/adeaPortal/adea/downloadcenter/CD/04_zambia_en.pdf.
- Schmidt, Karen, Joseph DeStefano, and Sterling Cummings. *Social and Behavior Change Communication (SBCC) Research in Senegal: Final Report*. Research Triangle Park, NC: RTI International, no date. <https://www.globalreadingnetwork.net/eddata/social-and-behavior-change-communication-sbcc-research-senegal-final-report>.
- Schroeder, Leila. *The Bantu Orthography Manual* (rev. ed.). SIL E-Books 9. Dallas, TX: SIL International, 2010. http://www.sil.org/system/files/reapdata/87/53/88/87538832212833420772710640253037052722/52716_BantuOrthographyManual.pdf.
- Schroeder, Leila. "Teaching and Assessing Independent Reading Skills in Multilingual African Countries: Not as Simple as ABC." In *Language Issues in Comparative Education: Inclusive Teaching and Learning in Non-Dominant Languages and Cultures*, edited by Carol Benson and Kimmo Kosonen, 245–264. Rotterdam, The Netherlands: Sense Publishers, 2013.
- Shulman, Susan. *Vamos Ler! Qualitative Study of Community Knowledge, Attitudes, & Practices (KAP) In Mozambique: Final Report*. Overseas Strategic Consulting, Ltd., Creative Associates International, Inc. (CAII), USAID Mission to Mozambique, 2017. https://pdf.usaid.gov/pdf_docs/PA00N7SF.pdf.
- Seymour, Phillip. H. K., Mikko Aro, and Jane M. Erskine. "Foundation Literacy Acquisition in European Orthographies." *British Journal of Psychology*, 94 (2003): 143–174. <https://onlinelibrary.wiley.com/doi/abs/10.1348/000712603321661859>.

- Shanahan, Timothy. *How Much Time on Comprehension and Phonics* (blog). October 20, 2013. <http://www.shanahanonliteracy.com/2013/10/how-much-time-on-comprehension-and.html>.
- SIL International. Glossary of Linguistic Terms. Dallas, TX: SIL International. No date. <https://glossary.sil.org/>.
- SIL LEAD and Chemonics International. *Report on Operations Research for ACCELERE! 1: Sociolinguistic Mapping and Teacher Language Ability*. Washington, D.C.: Chemonics International, 2018. https://dec.usaid.gov/dec/content/Detail_Presto.aspx?VID=47&ctID=ODVhZjk4NWQtM2YyMi00YjRmLTkxNjktZTcxMjM2NDNmY2Uy&rID=NTIxNjE0.
- Skutnabb-Kangas, Tove, and Kathleen Heugh, eds. *Multilingual Education and Sustainable Diversity Work from Periphery to Centre*. London, UK: Routledge, 2012.
- Smits, Jeroen, Janine Huisman, and Karine Kruijff. *Home Language and Education in the Developing World*. Background paper prepared for the Education for All Global Monitoring Report 2009. Nijmegen, Netherlands: Radboud University Nijmegen, 2008. <http://unesdoc.unesco.org/images/0017/001787/178702e.pdf>.
- Spratt, Jennifer, Simon King, and Jennae Bulat. *Independent Evaluation of the Effectiveness of Institut pour l'Education Populaire's "Read-Learn-Lead" (RLL) Program in Mali. Endline report*. Prepared for the William and Flora Hewlett Foundation, Grant No. 2008-3229 (RTI Project No. 0212015). June 2013 (revised). https://www.rti.org/pubs/mali_rll_eval_endline_report.pdf.
- Stone, Rebecca, Thomas de Hoop, Andrea Coombes, Mariela Goett, Mitchell Morey, and Kevin Kamto. *What Works to Improve Early Grade Reading in Latin America and the Caribbean: 2016 Update of a Systematic Review*. LAC Reads Capacity Program. Washington, D.C.: American Institutes for Research, 2015. <https://lacreads.org/sites/default/files/documents/systematicreview-508.pdf>.
- Thomas, Wayne, and Collier, Virginia. *School Effectiveness for Language Minority Students*. Series 9. Washington, D.C.: National Clearinghouse for Bilingual Education (NCBE). 1997. http://www.thomasandcollier.com/assets/1997_thomas-collier97-1.pdf.
- Thomas, Wayne, and Collier, Virginia. *A National Study of School Effectiveness for Language Minority Students' Long-Term Academic Achievement*. Berkeley, CA: Center for Research on Education, Diversity, and Excellence (CREDE), 2002. <http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.218.7013&rep=rep1&type=pdf>.
- Trudell, Barbara, and Leila Schroeder. "Reading Methodologies for African Languages: Avoiding Linguistic and Pedagogical Imperialism." *Language, Culture and Curriculum* 20, no. 3 (2007): 165–180.
- Trudell, Barbara, and Catherine Young, eds. *Good Answers to Tough Questions in Mother Tongue-Based Multilingual Education*. Dallas, TX: SIL International, 2016. <https://www.sil.org/literacy-education/good-answers-tough-questions-mother-tongue-based-multilingual-education>.
- UNESCO. *First Language First: Community-based Literacy Programmes for Minority Language Contexts in Asia*. Bangkok, Thailand: UNESCO, 2005. <http://mlenetwork.org/content/first-language-first-community-based-literacy-programmes-minority-language-contexts-asia>.
- UNESCO. *Mother Tongue Matters: Local Language as a Key to Effective Learning*. Paris: UNESCO, 2008. <http://unesdoc.unesco.org/images/0016/001611/161121e.pdf>.

- UNESCO. *Policy Guide on the Integration of African Languages and Cultures into Education Systems, Amended and Adopted by the Ministers of Education at the African Conference on Integration of African Languages and Cultures into Education, Ougadougou, Burkina Faso, 20–22 January 2010*. Hamburg, Germany: UNESCO Institute for Lifelong Learning; and Tunis Belvédère, Tunisia: Association for the Development of Education in Africa (ADEA), 2010. http://uil.unesco.org/fileadmin/keydocuments/Africa/en/policy_guide_sep_web_en.pdf.
- UNESCO. *2013/14 Education for All Global Monitoring Report. Teaching and Learning: Achieving Quality for All*. Paris, France: UNESCO Publishing, 2014. <http://www.unesco.org/new/en/education/themes/leading-the-international-agenda/efareport/reports/2013/>.
- UNESCO. *Advocacy Kit for Promoting Multilingual Education: Including the Excluded*. MTB-MLE Resource Kit. Bangkok, Thailand: UNESCO Asia and Pacific Regional Bureau, 2018a. <http://www.unescobkk.org/education/multilingual-education/resources/mtb-mle-resource-kit/>.
- UNESCO. *Improving the Quality of Mother Tongue-based Literacy and Learning: Case Studies from Asia, Africa and South America*. Bangkok, Thailand: UNESCO Asia and Pacific Regional Bureau, 2018b. <http://unesdoc.unesco.org/images/0017/001777/177738e.pdf>.
- UNESCO. *Mother Tongue-based Multilingual Education (infographic)*. Bangkok, Thailand: UNESCO Asia and Pacific Regional Bureau, 2018c. <http://unesdoc.unesco.org/images/0026/002659/265941E.pdf>.
- UNESCO. *Global Proficiency Standards: Reading and Mathematics, Grades 2-6*. 2019. <http://gaml.uis.unesco.org/wp-content/uploads/sites/2/2019/05/GAML6-REF-16-GLOBAL-PROFICIENCY-FRAMEWORK.pdf>.
- UNESCO Institute for Lifelong Learning (UIL) and Association for the Development of Education in Africa (ADEA). *Policy Guide on the Integration of African Languages and Cultures into Education Systems*. Hamburg: UNESCO, 2010. http://uil.unesco.org/fileadmin/keydocuments/Africa/en/policy_guide_sep_web_en.pdf.
- UNICEF. *Action Research on Mother Tongue-based Bilingual Education: Achieving Quality, Equitable Education*. Programme brief. Ha Noi, Vietnam: UNICEF and Vietnam Ministry of Education and Training, 2011. http://www.unicef.org/vietnam/brief_TA.pdf.
- UNICEF. *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa*. UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section, 2016. [https://www.unicef.org/esaro/UNICEF\(2016\)LanguageandLearning-FullReport\(SingleView\).pdf](https://www.unicef.org/esaro/UNICEF(2016)LanguageandLearning-FullReport(SingleView).pdf).
- United Nations. *Sustainable Development Goals – Goal 4: Quality Education*. Accessed November 11, 2019. <https://www.un.org/sustainabledevelopment/education/>.
- United Nations. *Quality Education: Why it Matters (brief)*. No date. <https://www.un.org/sustainabledevelopment/wp-content/uploads/2017/02/4.pdf>.
- United Nations Economic Commission for Africa, United Nations Educational, Scientific and Cultural Organization (UNESCO). *Conference of African States on the Development of Education in Africa, Addis Ababa, 15-25 May 1961. Final report*. Addis Ababa: UNESCO, 1961. <http://unesdoc.unesco.org/images/0007/000774/077416e.pdf>.
- United States Government. *U.S. Government Strategy on Basic Education*. Washington, D.C.: USAID, 2018. <https://www.usaid.gov/education/usg-strategy>.

- USAID. *Toolkit for Setting Internationally-linked Benchmarks in Early Grade Reading and Math*. Washington, D.C.: USAID, 2019. <https://www.edu-links.org/resources/toolkit-setting-internationally-linked-benchmarks-early-grade-reading-and-math>.
- USAID. *USAID Education Policy*. Washington, D.C.: USAID, 2018a. <https://www.usaid.gov/education/policy>.
- USAID. *Cost Reporting Guidance for USAID-Funded Education Activities*. Washington, D.C.: USAID, 2018b. <https://www.edu-links.org/sites/default/files/media/file/USAID%20Cost%20Reporting%20Guidance%202018%20FINAL%20%281%29.pdf>.
- USAID. *Annexes for Cost Reporting Guidance for USAID-Funded Education Activities*. Washington, D.C.: USAID, 2018c. <https://www.edu-links.org/sites/default/files/media/file/Annexes%20FINAL.pdf>.
- USAID. *Foundational Skills Development Learning Agenda*. Washington, D.C.: USAID, 2019. <https://www.edu-links.org/sites/default/files/media/file/USAID%20FSD%20Learning%20Agenda.pdf>.
- USAID/Cambodia, “Education and Child Protection” (webpage). Last modified August 23, 2019. <https://www.usaid.gov/cambodia/education>.
- USAID/Mali. *Etude sociolinguistique sur l'adéquation entre la demande et l'offre d'enseignement bilingue dans la région de Mopti* (Sociolinguistic Study of the Match Between Demand and Supply of Bilingual Education in the Mopti Region). Washington, D.C.: USAID, 2011.
- van Ginkel, Agatha J. *Additive Language Learning for Multilingual Settings*. Washington, D.C.: JBS International, 2014. https://pdf.usaid.gov/pdf_docs/PA00JW1R.pdf.
- Vawda, Ayesha Yaqub, and Harry Anthony Patrinos. “Producing Educational Materials in Local Languages: Costs from Guatemala and Senegal.” *International Journal of Educational Development* 4, no. 5 (1999): 287–299. [https://doi.org/10.1016/S0738-0593\(99\)00027-9](https://doi.org/10.1016/S0738-0593(99)00027-9).
- Walter, Stephen L., and Godfrey Kain Chuo. *The Kom Experimental Mother Tongue Education Pilot Project Report for 2012*. Cameroon: SIL International, 2012.
- Wolf, Sharon, Elizabeth L. Turner, Matthew C.H. Jukes, Margaret M. Dubeck. *Changing Literacy Instruction in Kenyan Classrooms: Assessing Pathways of Influence to Improved Early Literacy Outcomes in the HALI Intervention*. *International Journal of Educational Development*, 62 (2018): 27-34. https://www.poverty-action.org/sites/default/files/publications/Wolf%20Turner%20Jukes%20Dubeck_2018_IJED%5B1%5D.pdf.
- World Bank. *In Their Own Language... Education for All*. *Education Notes*, Washington, D.C.: World Bank, June 2005. http://siteresources.worldbank.org/EDUCATION/Resources/Education-Notes/EdNotes_Lang_of_Instruct.pdf.
- World Federation of the Deaf. *Situating Deaf Communities within “Disability” vs Cultural and Linguistic Minority Constructs*. 2019. <http://wfdeaf.org/news/resources/wfd-position-paper-complementary-diametrically-opposed-situating-deaf-communities-within-disability-vs-cultural-linguistic-minority-constructs/>.

Ziegler, Johannes C. and Usha Goswami. "Reading Acquisition, Developmental Dyslexia, and Skilled Reading Across Languages: A Psycholinguistic Grain Size Theory." *Psychological Bulletin* 131, no. 1 (February 2005): 3-29. doi: 10.1037/0033-2909.131.1.3

Annex A. Advantages of instruction in languages children speak, use and understand: A summary of the evidence

This annex has been reproduced, with minor edits, from:

Pflepser, Alison, Carol Benson, Colette Chabbott, and Agatha J. van Ginkel. *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes*. Research Triangle Park, NC: RTI International, 2016.

https://www.globalreadingnetwork.net/sites/default/files/eddata/Language_Use_in_Education_guidance_May_2016_FINAL.pdf.

Another useful summary of the benefits of instruction in languages children speak, use and understand can be found in:

UNICEF. *The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa*.

UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section, 2016. [https://www.unicef.org/esaro/UNICEF\(2016\)LanguageandLearning-FullReport\(SingleView\).pdf](https://www.unicef.org/esaro/UNICEF(2016)LanguageandLearning-FullReport(SingleView).pdf).

A significant body of research demonstrates that providing education in familiar languages confers many advantages to an education system, its teachers, and children—and to society overall. These advantages include the following:

1. Improves education access, equity and inclusion.

Children who understand the language of instruction are more likely to enter school on time, attend school regularly, and drop out less frequently. An analysis of data from 26 countries and 160 language groups showed that children who had access to instruction in their mother tongue were significantly more likely to be enrolled and attending school, while a lack of education in the first language was a significant reason for children dropping out (Smits, Haisman, & Kruijff, 2008). If instruction in children's L1 was available in half or more of schools, the percentage of out-of-school children in that group was 10 percentage points lower than if little or no access to L1-instruction was available. Moreover, the positive effects of L1 instruction were stronger for groups concentrated in rural areas, a key finding for countries like Malawi with a large percentage of the population outside urban centers. In another study in Mali, learners in classrooms that used children's L1 as the language of instruction were five times less likely to repeat the year and more than three times less likely to drop out (World Bank, 2005). Given the high levels of repetition and dropout in many low-income countries, this evidence is particularly noteworthy.

Providing instruction in a language girls understand has been found to support their retention, identification as “good” students and achievement (Benson, 2004; Hovens, 2002, 2003). In a number of studies, L1-based instruction has had an especially positive effect on girls' enrollment, attendance and school participation. This is likely to be because girls and women often have different opportunities than boys and men to access languages other than their L1 or home language(s). Research reviewed by Dutcher (2001) and O'Gara & Kendall (1996) showed that unless girls and women

work in markets or factories, they are much less likely than their male counterparts to be exposed to an L2. Differences in language competence often go unnoticed at school, especially if girls are given fewer opportunities to speak, and if teachers expect them to do less well than boys. Any reticence on the part of girls to speak may be interpreted as lack of academic ability, rather than lack of exposure to the language of instruction. Researchers in Africa (e.g., Benson, 2004; Hovens, 2002, 2003) and Latin America (e.g., Sichra, 1992) have found that girls who learn in the L1 stay in school longer, are more likely to be identified as good students, do better on achievement tests, and repeat grades less often than their peers who do not learn through a familiar language. This evidence suggests that using the L1 for teaching and learning greatly improves opportunities for educational access and attainment for female students.

For children who are deaf, the issue of language use in schools—and specifically the use of sign language—is also critical to equity in education. Providing quality instruction in sign language is essential to enabling this population of students to attend school, to learn and to succeed in academics and beyond.

2. Facilitates efficient reading acquisition

Importantly, instruction in a familiar language also improves reading outcomes. Children learn to read faster if they speak the language of instruction because they already have a “mental storehouse” of vocabulary, knowledge of the linguistic construction of the language, and the ability to pronounce the sounds of the language. This prior knowledge facilitates learning to read, as well as comprehension.

Analyses from the 2011 Progress in International Reading Literacy Study (PIRLS), conducted in 49 countries, showed a clear relationship between language and reading outcomes. Higher average achievement in reading was associated with learners who attended schools where a greater percentage of pupils spoke the language of the PIRLS assessment as their L1 (Mullis, Martin, Foy, & Drucker, 2012). Specific country programs also show the influence of language of instruction on reading. An evaluation of the Primary Reading Programme in Zambia, which served 1.6 million children between 1999 and 2002, revealed that grade 2 pupils who received instruction in their L1 showed 575% improvement in their reading and writing scores in English compared to children in English-only programs. Grade 1 children's reading and writing scores in Zambian languages improved 780% (Sampa, 2005).

In Kenya, a large randomized controlled trial demonstrated the effectiveness of teaching children in two mother tongues in comparison to teaching in one of the national languages, Kiswahili. The results of the USAID- and DFID-supported PRIMR project's pilot of an instructional package including teacher training and materials in two mother tongues (Lubukusu and Kikamba) resulted in significant gains in reading outcomes for children learning to read in their mother tongue, as compared to Kiswahili. When they were assessed in fundamental reading-related skills such as letter-sound fluency, decoding, oral reading fluency, and reading comprehension, the mother tongue learners' average scores were twice those of children learning in Kiswahili (Piper, 2015).

In Uganda, grade 1 students who received instruction from teachers trained in providing reading instruction in L1 and who received materials in their language performed better than their peers in control schools (identified 20 letters per minute and read 7 words per minute compared to 6 letters per minute and reading 1 word per minute) (Brown, 2011). Similarly, in Mali, children in an L1 program supported by the *Institut pour l'Education Populaire* performed better than their peers in control schools at the end of two years of instruction, although results indicated that better instruction may still be needed to improve fluency (Spratt, King, & Bulat, 2013).

3. Supports acquisition of additional languages

Learning to read in one's L1 also facilitates L2 and foreign-language acquisition. A substantial body of research suggests that literacy and other skills and knowledge transfer across languages. (See section 2.4 of this resource for a summary of key research and findings.) In other words, if a child learns something in one language—such as decoding skills and comprehension strategies—the child can transfer these skills to another language. (For interlinguistic transfer to be successful, children will need explicit instruction and support in transferring skills from one language to another.)

Five meta-analyses, or analyses of *multiple* research studies, from the United States found that “learning to read in the home language promotes reading achievement in the second language” (Goldenberg, 2008, p. 14). In Africa as well, instruction in local languages has proved helpful in improving outcomes in L2 or foreign languages. In Mali, for example, extensive use of L1-based instruction in primary years resulted in improved mastery of French (World Bank, 2005).

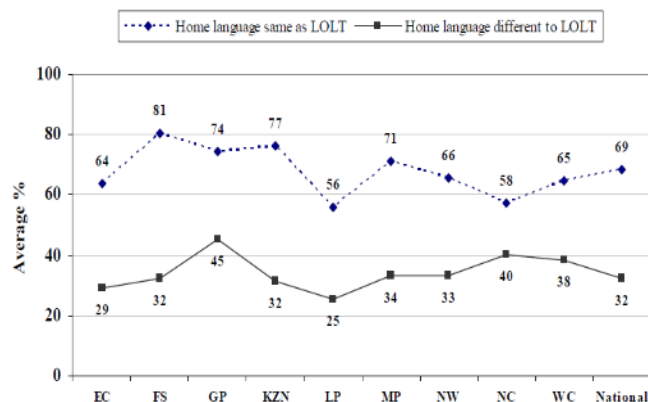
Research from Kenya further supports these findings. An analysis of grade 3 learners' reading skills in their L1 (Gikuyu and Dholuo), Kiswahili (an L1 for some, but an additional language to others) and English found a correlation between learners' L1 reading skills and English outcomes, children with high/strong L1 literacy/language skills had high English-language skills whereas children with poor L1 skills acquisition also had poor English-language skills (Piper, Schroeder and Trudell, 2015).

4. Improves learning outcomes

Being able to read and understand the language used in the classroom in turn facilitates the learning of academic content. A comprehensive review of research and reports on language and literacy concluded that becoming literate and fluent in a familiar or first language is key to children's overall language and cognitive development, as well as their academic achievement (Ball, 2011). Evidence from numerous countries attests to the improved learning outcomes that accompany instruction—and assessment—conducted in familiar languages. For example, an analysis of results from the large-scale international assessment Trends in International Mathematics and Science Study (TIMSS), conducted in 36 countries in grade 4 and 48 countries in grade 8, found that children who reported “always” or “almost always” speaking the language of the test at home performed better in math and science than those who reported they “sometimes” or “never” spoke the language in which they were tested (Martin, Mullis, & Foy, 2008).

Data from South Africa further revealed that learning outcomes were higher for pupils whose home language was the same as that of classroom teaching and learning. In **Figure A1** below, the dotted line indicates scores for children whose home language was the same as that used in the classroom, while the solid line connects average scores for children whose home language was different (South Africa Department of Education's *Grade 6 Systemic Evaluation National Report*, 2005, as cited in Heugh, Benson, Bogale, & Yohannes, 2007). (The abbreviations below the graph indicate the names of different provinces “LOLT” is language of learning and teaching.)

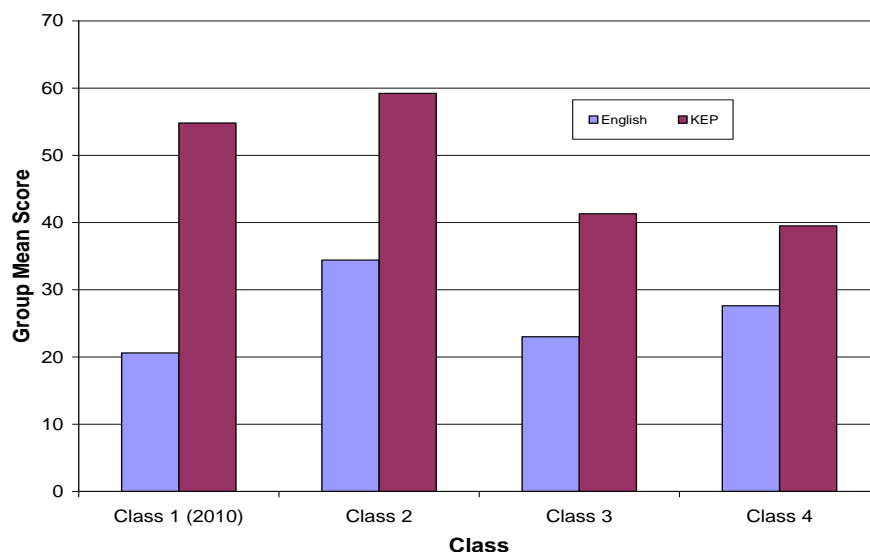
Figure A1. South Africa grade 6 achievement by home language and province, 2005



A five-year study (2008–2012) of a pilot program in Cameroon also demonstrated that children who were taught in a familiar language, Kom, performed significantly better—124% on average—in multiple subjects (including math and English) than a control group of peers who attended schools where English was the MOI (Walter & Chuo, 2012).

Figure A2 shows the significant difference in learning outcomes for children in the Kom language program (KEP) and children in the English-medium program (English).

Figure A2. Cameroon Kom program – 2011 results



In Mali, students in bilingual schools (called *Pédagogie Convergente* schools) learn exclusively in their L1 in the first few years of primary education, then learn in French for half of the school day in grades 5 and 6. Evaluations have shown that these children consistently outperform their peers in French-only schools on end-of-primary school national exams (UNESCO, 2008).

In Vietnam, educators developed a new curriculum to provide instruction in familiar languages to minority-language speakers in the country. The result was that 68% of grade 1 learners achieved the level of “excellent” compared to only 28% of children who were not learning in their L1 (UNICEF, 2011). Importantly, the improvements in learning outcomes were true in math as well; children who received math instruction in a familiar language scored, on average, 75% on the assessment, while children who received instruction in an unfamiliar language scored only 61% (UNICEF, 2011). Similarly, an analysis of the achievement of year 8 learners in Ethiopia between 2000 and 2004 showed that

performance in mathematics and science was far better for those using L1 as the MOI than for those using English. Research from southern Africa, too, has shown the influence of language on learning. In Botswana, pupils taught in Setswana had significantly better understanding of science concepts than pupils taught in English (Alidou & Brock-Utne, 2011).

Importantly, instruction in L1 languages that includes *assessment* in a familiar language allows pupils to better show what they have learned, leading to more accurate learning assessments because language is no longer a “confounding factor” in interpreting the results.¹ This in turn helps teachers to better identify what children know and do not know, and consequently provide appropriate instruction. Moreover, use of L1 for assessment appears to be particularly beneficial for girls because any negative preconceptions on the part of teachers regarding girls’ academic ability are challenged (Benson, 2005; Hovens, 2002; Ouane & Glanz, 2010).

5. Promotes effective, more learner-centered teaching practices and assessment

Use of familiar local languages also confers benefits to teachers, who themselves face significant difficulties when asked to present academic concepts in a language they do not speak well. Classroom observations conducted in several countries (Benin, Botswana, Burkina Faso, Ethiopia, Ghana, Guinea-Bissau, Mali, Mozambique, Niger, South Africa, Tanzania, and Togo) showed that when teachers used a language that was unfamiliar to learners (and likely to themselves as well), they relied on teacher-centered teaching methods such as chorus teaching, repetition, memorization, recall, and code-switching that are largely ineffective (Alidou & Brock-Utne, 2011). On the other hand, when teachers and learners speak a common, familiar language, teachers use more varied and effective teaching practices. For example, a study in Tanzania and Ghana found that teachers used a wider range of teaching and learner-involvement strategies when they taught lessons in African languages than when they taught in English (EdQual, 2010). Similarly, a study of a bilingual education program in Niger showed that more teachers used more effective teaching practices, and there was more dynamic interaction between teachers and pupils, as well as among pupils themselves (Hovens, 2002) than teachers in a single-language comparison group. Additionally, teaching was more learner-centered, teachers used more open-ended questions, and teachers allowed pupils to find solutions to problems (Hovens, 2002).

Additionally, children’s affective domain, involving confidence, self-esteem and identity, is strengthened by use of the L1, increasing motivation and initiative as well as creativity. L1 classrooms allow children to be themselves and develop their personalities as well as their intellects. Enjoyment of school and experiencing success are factors that improve attendance, participation and achievement, as documented by studies of classroom interaction and interviews with students, teachers, and families (Alidou, Batiana, Damiba, Pare, & Kinda, 2008; Ball, 2011).

6. Supports parental and community involvement in education

When children learn in a familiar language, their home culture is validated and reinforced, creating a bridge between the formal school system and the community. This, in turn, facilitates parental involvement and strengthens community support for education because language is not a barrier to participation in their children’s education. Rather, use of familiar or home language in school makes the school, teacher, and curriculum more accessible to all. Parents in particular are better able to be involved in their children’s education when they speak the language used for education, since they are better able to communicate with teachers about their children’s progress and schoolwork, to provide

¹ If assessments are conducted in a language a child does not understand, poor outcomes are difficult to interpret because one does not know whether the child did not understand the academic content, or if s/he simply did not understand the language of the assessment.

support to their children at home, to bring their own local knowledge into the formal education environment, and to hold schools and teachers accountable. Evidence from Papua New Guinea, for example, shows that when the government established L1-based bilingual education in 1995, community demand for education increased significantly, leading to local development of materials and bringing the number of languages used in education to 400 by the year 2000 (Malone & Paraide, 2011). In Ghana, education provided to children in their home languages has similarly resulted in increased awareness among parents and the community of the importance of L1-based instruction in facilitating learning outcomes, in terms of both content knowledge and English-language learning (Casely-Hayford, Ghartey, & The School for Life Internal Impact Assessment Team, 2007). When children's home language is used in schools, parents can also help their children with schoolwork, and perhaps acquire literacy skills in their L1 as well (Chimbutane, 2011).

7. Improves education efficiency

A frequent argument against providing L1 instruction is the mistaken assumption that it “costs too much.” However, analysis has shown that providing instruction to children in a language they understand is likely to be much more cost effective, due to the reduction in repetition, dropouts, and poor learning outcomes. A study of an L1-based education program in Mali, for example, found that the program cost about 27% less for a six-year primary cycle than for the traditional French-only model (World Bank, 2005). Another study in Guatemala estimated that the cost savings of bilingual education was \$5 million per year because of a reduction in dropouts and repetition rates—an amount equal to the cost of primary education for 100,000 pupils (Patrinos & Velez, 2009).²

Even though a country may incur initial start-up costs associated with the production of materials in new languages, these are recovered in the long run due to improvements in efficiency. Although each country will have to conduct its own budgeting exercise to identify the costs—and savings—associated with providing instruction in familiar languages, analysis from Guatemala and Senegal estimates that the cost of producing local-language materials would be 1% of the education budget where orthographies and language development units already exist (Vawda & Patrinos, 1999). Other analysis indicated that immediate costs associated with the development of L1-based instruction would be covered by a 4- to 5-percent increase in a country's education budget, while long-term costs would be reduced due to improved internal efficiency (i.e., fewer students repeating and dropping out) (Heugh, 2011).

Analysis by François Grin (2005), a specialist in language and the economy, showed that although some aspects of education provision in L1 may be “slightly more expensive” than provision of education in L2, the actual cost of “teaching and training would by and large cost the same, irrespective of the language in which it takes place” (Grin, 2005, p. 20, as quoted in Heugh, 2011b, p. 277). He concluded that because using children's L1 conferred significant advantages with respect to educational outcomes (higher achievement, less repetition, and lower dropouts, and an increase in the number of years of schooling), this in turn would lead to a “higher stock of human capital,” which is a “predictor of labour productivity, and hence of earnings” (Grin, 2005, pp. 20–21, as quoted in Heugh, 2011, p. 278). Through analyzing the costs of various language-in-education models over a five-year period, he concluded education systems would actually save money, while gaining long-term benefits (Grin, 2005, p. 22, as cited in Heugh, 2011, p. 279).

² Another analysis of Guatemala's schools showed that the cost per grade 6 graduate of Spanish-medium schools was \$3,077, while the cost for bilingual schools that provided instruction in familiar languages was \$2,578. If applied nationwide, the estimated cost savings would have been more than \$11 million (Walter, 2009, as cited in Pinnock, 2009a).

Given that the largest share of education sector budgets is generally teacher salaries and school infrastructure—costs that are not related to the language of instruction—providing schooling in languages that children understand well is not likely to significantly alter the overall education budget. Indeed, cost-effectiveness may improve as more children receive a quality education and are able to contribute to a country's economy via improved opportunities for further employment and greater contributions in the form of taxes. Moreover, literature from the health field has found that education reduces fertility rates, improves maternal health, and reduces infant mortality (UNESCO, 2011). For example, in Malawi, 27% of women with no education knew that HIV transmission risks can be reduced by the mother taking drugs during pregnancy; for women with secondary education, the figure rose to 59%. This institutionalization of knowledge through education in turn reduces the burden on the state in terms of health care costs and reduced labor productivity.

8. Strengthens institutions and reduces likelihood for conflict

Providing children with access to high-quality education endows them with the skills and knowledge they need to gain employment and to positively contribute to their community's and country's overall well-being. This, in turn, helps to reduce social exclusion and poverty, thereby reducing the likelihood for social unrest and conflict. In contrast, children who are excluded from learning due to the language of instruction are less likely to gain vital literacy, numeracy and other skills, meaning they are more likely to experience social exclusion, which can in turn lead to weak institutions and poverty within a country.

The existence of strong institutions—including education systems—in areas of high ethnolinguistic diversity has been shown to decrease the likelihood of war and slow economic growth (Easterly, 2001). Conversely, research has shown that high levels of ethnic and linguistic division significantly lead to weaker institutions and slower economic growth (Alesina, Devleeschauer, Easterly, Kurlat, & Wacziarg, 2003). Indeed, lack of appropriate language-in-education policies has actually led to violence: In Syria in 2004, for example, 30 people were killed and more than 160 were injured as a result of the Syrian government's attempt to ban the Kurdish language from schools. In China, monolingual education in Mandarin has contributed to the exclusion and dropout of Uyghur, Mongol, and Tibetan minority groups, which—coupled with other rights abuses—has fostered unrest in the affected regions (Pinnock, 2009a).

Annex B. Myths and assumptions about L1-based multilingual education

The information in this annex has been reproduced, with updates, from:

Pflepser, Alison, Carol Benson, Colette Chabbot, and Agatha J. van Ginkel. *Planning for Language Use in Education: Best Practices and Practical Steps to Improve Learning Outcomes*. Research Triangle Park, NC: RTI International, 2016.

https://www.globalreadingnetwork.net/sites/default/files/eddata/Language_Use_in_Education_guidance_May_2016_FINAL.pdf.

Despite the acknowledgment by many of those responsible for education sector planning and funding that children learn better when they understand the language used for teaching, questions and concerns about how to operationalize L1-based education and to provide effective instruction of—or in—additional languages often lead to stakeholders to question whether L1-based education is feasible or even necessary, especially where demand is high for skills in non-indigenous languages such as English and French. These frequently cited concerns include the following:

- assumptions that the large number of languages in many countries makes instruction in familiar languages too complicated and costly;
- a belief that a foreign language is most effectively taught by providing instruction in it;
- a belief that parents are or will be opposed to instruction in national languages;
- opposition by policy makers and senior education officials;
- an assumption that implementing L1-based education requires producing teaching and learning materials for all grades, in every language in the country, simultaneously; and
- a belief that providing instruction in L1 or other languages with which children are familiar will lead to ethnic conflict.

Yet, as described in the table below and discussed throughout this resource, each of these challenges—real or perceived—can be effectively addressed with thoughtful planning.

Evidence-based responses to frequently cited concerns, assumptions and challenges about L1-based instruction

Concerns and assumptions	Responses and approaches
Stakeholder attitudes and beliefs	
<ul style="list-style-type: none">• No need for L1-based instruction (not source of poor education outcome, preference for instruction in L2/additional languages).	<ul style="list-style-type: none">• While numerous problems persist in many low-income countries, the language in which teaching and learning takes place is proven to have a significant effect on education access, quality and equity. If students do not understand the language in which education is provided, they are not likely to succeed.• Share with stakeholders evidence-based information related to language, literacy and learning (through formal workshops, informal discussions,

Concerns and assumptions	Responses and approaches
<ul style="list-style-type: none"> • Children already know their home/mother tongue language, so they should learn an L2 at school. • Parents and caregivers do not want L1-based instruction; prefer children to learn in L2/foreign languages associated with “prestige” or economic mobility. • Using indigenous/national languages in the education system will hinder a country’s growth and participation in global economy. • National unity will be compromised if multiple languages are used for instruction. 	<p>production of communications materials, media and social media) to build knowledge and a shared understanding of issues. See Section 2.2 for summary of key evidence and “talking points” related to how children learn to read and learn an additional language best.</p> <ul style="list-style-type: none"> • Conduct a survey of stakeholder knowledge, attitudes and beliefs and experiences around language-related issues to identify what they are and how to address. • Involve key stakeholders, including education authorities, parents and teachers, in relevant aspects of program design, implementation and evaluation to build knowledge and skills. • Even in a globalized economy, L1 skills are still vital at the local level for communication and commerce. A country’s growth is hindered when its population remains uneducated and does not acquire the skills needed for a modern economy. Using languages children understand helps them to gain such skills. • National unity is promoted when education offers equitable opportunities for all. The presence of strong institutions—including education systems—in areas of high ethnolinguistic diversity actually decreases the likelihood of conflict.
Instruction and materials	
<ul style="list-style-type: none"> • Some languages may not be sufficiently “developed” for academic instruction, especially in subjects like science and mathematics • Using L1 will hinder Lx development, and/or the learning process itself • Children learn languages quickly at a young age, so starting instruction in the L2 is better • Some languages have not ever been used for instruction, and therefore lack a curriculum • Lack of literacy materials and/or few or no materials for teaching curricular content 	<ul style="list-style-type: none"> • Languages (both writing systems and terminology) develop over time and with use, so using a language for instruction actually fosters development. Universities, language experts, and linguistic organizations can help communities develop and standardize writing systems for their languages. • Language analysis can be conducted to develop curriculum appropriate for the language. Engage language and reading specialists to develop evidence-based instructional approach and materials (see Section 3.2 for guidance). • Strong L1 literacy skills also facilitate the acquisition of additional languages, and support children’s learning in other subjects. When parents and teachers understand that instruction does not need to be “either L1 or L2” and that L1-based instruction can actually facilitate L2/Lx development and improve learning outcomes, they tend to favor a bilingual approach. • An inventory and review of existing materials can often identify resources that can be used or modified. Additional literacy and subject materials can be developed over a relatively short amount of time with good planning (see Section 3.3 for details). • The experiences of numerous reading improvement programs demonstrate that it is possible to develop curriculum and materials in many languages in a relatively short period of time. Share these experiences, outlined in Section 3.3 of this resource. Develop a plan specific to the context, use and adapt existing tools and resources (see Annex C of this Handbook for a list).

Concerns and assumptions	Responses and approaches
<p>Teacher knowledge, skills and beliefs</p> <ul style="list-style-type: none"> Teachers are not literate in languages their students speak; have little training in teaching L1 as subject or teaching content in L1 Teachers are unfamiliar with and may even be opposed to instruction in L1 or children's familiar languages because they did not experience it themselves Teachers lack knowledge regarding bilingual and multilingual education pedagogy 	<ul style="list-style-type: none"> As with other education stakeholders, provide teachers with information about the benefits of teaching children to read in their L1, as well as to a bilingual approach to instruction. Teachers' unions and in-service training opportunities present opportunities to share and discuss information. Collect data on teacher language skills (e.g., proficiency in languages used or to be used for instruction) to appropriately target professional development that can be shared with teachers. Identify how to integrate issues of language and literacy into pre- and in-service training and how to align it with reading and language curriculum in schools (e.g., integration of language issues into existing courses, development of new courses on reading, etc.) Provide pre- and/or in-service teacher training in the languages in which teachers will be providing instruction (see Section 3.4 for guidance). Provide opportunities for teachers and teacher educators to increase their knowledge related to literacy acquisition, language development, and bilingual methodologies so that teachers feel prepared to teach in L1-based, multilingual classrooms. Consider organizing L2/Lx subject teaching by specialized teachers to maximize resources, minimize costs, reduce the burden on teachers to be both language and subject experts, and improve the quality of teaching. Conduct language mapping to identify where teachers are placed and whether their language skills "match" those of their learners/communities. Policies and practices related to teacher recruitment and placement can also be reviewed and updated through a consultative process to ensure that teachers are placed in schools where they speak their students' language, while being sensitive to concerns for teacher mobility (see Section 3.4 for case studies and information.)
<p>Planning and systems issues</p> <ul style="list-style-type: none"> Too many languages used in the country to provide all children with instruction in their L1. Providing instruction in multiple languages is simply too logistically complicated. Not possible politically to change LOI policy or to implement existing policy; no leadership or will to do so. 	<ul style="list-style-type: none"> Language mapping can provide concrete information to help identify the languages needed for instruction, which can be used to support dialogue and decision-making. (Often, a majority of the population can be reached by a feasible number of languages, while a language of wider communication can be used as well.) Education systems can phase in use of different languages as orthographies are standardized, materials are developed, teachers are trained, and experience is gained. Build the knowledge and capacity of relevant stakeholders to help design, implement and evaluate an approach to using language for reading and

Concerns and assumptions	Responses and approaches
<ul style="list-style-type: none"> • Lack of capacity to design and implement effective approach to language use for instruction. • Too challenging to obtain consensus on languages to be used for reading instruction. 	<p>instruction more generally. Identify potential leaders and “cultivate” them to be leaders on language-related issues.</p> <ul style="list-style-type: none"> • Conduct pilot studies on specific approaches for L1-based and bilingual instruction; communicate outcomes to build evidence and support. Monitor and evaluate language-related issues, and report results by language; use results to inform modifications and expansion of a program. • Experiences from USAID programs demonstrate that implementing instruction in multiple languages can be accomplished and results in better student outcomes. The advantages of taking a long-term approach to planning outweigh the cost of maintaining the status quo.
Cost	
<ul style="list-style-type: none"> • Providing instruction and materials in multiple languages is “too costly.” 	<ul style="list-style-type: none"> • Cost-benefit analyses indicate that initial start-up costs are recovered through higher retention rates and better learning outcomes when pupils learn and stay in school. Most significant recurrent costs in the education sector (e.g., teacher salaries and infrastructure) are not related to language and will not change if additional languages are used for instruction. • Conduct language-specific cost-effectiveness analysis and budgeting for all aspects of the program (e.g., language mapping, materials development, etc.) • Cost efficiencies can be realized through systematic planning of materials production; for example, materials developed in one language may be translated or adapted without incurring significant costs. Resources can be formatted in a way that allows for multiple languages (i.e., teachers’ guides with information in multiple languages). Many USAID programs have developed materials in multiple languages, and resources and guidance are available to support this process (see Section 3.3 for details). • The cost of smaller print runs will decrease if demand for language-specific materials increases from the education sector, parents, and others. Collaboration across regions and countries that share the same languages can further reduce costs over time. Reading programs have been working with publishers and printers to increase capacity and decrease costs.

Annex C. Resources for planning for language use in education

This annex includes a list of resources, including reports, tools, toolkits, software and organizations, related to the topics and issues discussed in this Handbook. A summary of each resource and hyperlink to it is provided.

Resource	Summary
Introduction	
USAID. (2018a). USAID Education Policy .	USAID's Education Policy provides guiding principles that supported efforts to use language in education to improve education access, quality and equity.
Gove, A., Moore, A-M, and McCardle, P., Eds. (2007). Progress Toward a Literate World: Early Reading Interventions in Low- and Middle-Income Countries . Special issue of <i>New Directions for Child and Adolescent Development</i> 155 (2007).	Summarizes progress to date on USAID early grade reading interventions. The resource includes in-depth case studies of efforts to provide reading instruction in children's first and additional languages.
Graham, J. and Kelly, S. (2018). How Effective Are Early Grade Reading interventions? A Review of the evidence . Policy Research Working Paper 8292. Education Global Practice Group. World Bank Group.	Summarizes and reviews the evidence of the impact of early grade reading programs, primarily those supported by USAID.
Section 1. Why language is critical to learning	
Annex A. Advantages of Instruction in Languages Children Speak, Use and Understand. In <i>Handbook on Language of Instruction Issues in Reading Programs</i> (2019).	This annex presents a summary of the evidence and benefits of providing children with access to a quality education in a language they understand.
Ouane, A. and Glanz, C. (eds.). (2011). Optimising Learning, Education and Publishing in Africa: The Language Factor . <i>A Review and Analysis of Theory and Practice in Mother-Tongue and Bilingual Education in Sub-Saharan Africa</i> .	Presents the results of comprehensive research that assesses the experiences of mother-tongue and bilingual education programs. Surveys scientific and empirical evidence pertaining to language use and its implications on the quality of MLE efforts in 25 African countries. Critiques educational programs and related language policies.
UNICEF. (2016.) The Impact of Language Policy and Practice on Children's Learning: Evidence from Eastern and Southern Africa . UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section.	The first section of this resource provides a helpful summary of language of instruction issues and relevant research.

Resource	Summary
Pinnock, H. (2009a). Language and Education: The Missing Link. How the Language Used in Schools Threatens the Achievement of Education for All . London, UK: Save the Children and CfBT Education Trust.	Reviews investment choices for national governments in linguistically diverse countries. Identifies major challenges to providing quality multilingual basic education.
Section 2. Effective reading and language instruction – What works	
Barnes, A. & Pallangyo, A. (2019, July 17). Key Early Grade Reading Skills and Strategies for Effective Instruction and Assessment . [webinar]. REACH/Global Reading Network.	This webinar and training module, part of a series, provides detailed information on the critical early grade reading and writing skills children need to learn, as well as strategies and activities for effectively teaching and assessing them. Language-specific issues related to EGR skills and instruction are discussed. A recording of the webinar and a downloadable package of resources are available.
Ball, J. (2011). Enhancing Learning of Children from Diverse Language Backgrounds: Mother Tongue-based Bilingual or Multilingual Education in the Early Years . Paris: UNESCO.	This resource provides a comprehensive literature review of mother tongue-based (MTB) bilingual or multilingual education (MLE) for children starting in early childhood. It also provides typology of key components of effective bilingual and multilingual education programs.
Section 3.2. Instruction and Assessment. In <i>Handbook on Language of Instruction Issues in Reading Programs</i> , 2019.	See additional resources in this section.
Section 3.1 – General Planning	
Annex D. Conducting a Language-Specific Situation Analysis: Key Steps to Take and Information to Gather. In <i>Handbook on Language of Instruction Issues in Reading Programs</i> , 2019.	This annex summarizes key components of a situational analysis intended to gather information specific to language issues to inform reading program development and implementation.
Annex E. Language Mapping Experiences and Resources. In <i>Handbook on Language of Instruction Issues in Reading Programs</i> (2019).	Summarizes language mapping exercises conducted as part of USAID-funded early grade reading programs in Afghanistan, the Democratic Republic of the Congo, Ghana and Mozambique. The annex includes links to full reports from these language mapping exercises.
Healey, F. H., Morris, E., and Kochetkova, E. (2019). Literacy Landscape Assessment Toolkit . Prepared by University Research Co., LLC (URC) under the Reading within Reach (REACH) initiative.	This Toolkit provides information and tools to support a comprehensive contextual analysis to inform the design of a USAID literacy improvement initiative.

Resource	Summary
Eberhard, D. M., Simons, G., and Fennig, C. (eds.). Ethnologue: Languages of the World . Twenty-second edition. Dallas, Texas: SIL International.	This resource, available online, provides information on the world's languages (including sign language), language maps, a dictionary of terms related to language and linguistics, and links to additional resources about specific languages and countries.
Latin American and Caribbean (LAC) Reads Capacity Program (LRCP) Resource Database	This searchable database, developed by the LAC Reads Capacity Program, houses research and resources on language and literacy to support stakeholders in the LAC region. The database offers resources in English, French, and Spanish.
Pflepsen, A. & Barnes, A. (2018, July 24). Language Considerations in Early Grade Reading Programs . [webinar]. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative.	This webinar and training module, part of a series, includes information and guidance related to the many language-specific issues that need to be considered when designing, implementing and evaluating an EGR program. A recording of the webinar and a downloadable package of resources are available.
Linguistics and orthography issues	
SIL LEAD	This organization provides resources, including documents, software, and human resources to support effective use of language in education. (Click on the “resources” tab to find them.) SIL LEAD’s linguists and language experts can assist in orthography development and standardization, materials development, and literacy education and have supported several USAID early grade reading programs.
The African Linguistic Network	This network’s website allows program planners and implementers to post jobs and find linguists and language experts.
SIL LEAD (2017). Orthography Assessment Score Sheet .	This worksheet helps guide the assessment of a language’s orthography to evaluate its readiness to be used for teaching and learning.
Schroeder, L. (2010). The Bantu Orthography Manual (Rev. ed.). SIL E-Books 9.	This manual provides guidance on how to develop an orthography in a Bantu language. It also contains information on orthography development that are applicable to any language.

Resource	Summary
Schroeder, L. (2016). When the orthography of the local language is not yet standardized or requires further review in order to adequately represent the linguistic features of the language, how should this challenge be handled in the program? In Good Answers to Tough Questions in Mother Tongue-Based Multilingual Education.	This chapter describes issues to consider and approaches to take to standardize an orthography in order to use it for literacy instruction.
Robinson, C. with Karl Gadelii. (2003). Writing Unwritten Languages: A Guide to the Process . Working paper. UNESCO	Chapter 3 of this resource describes considerations and steps related to developing a new writing system.
World Atlas of Language Structures (WALS)	Large database of structural (phonological, grammatical, lexical) properties of languages.
Conflict-sensitive education programming	
James Rogan and Ashley Henderson. (USAID, 2018). Rapid Education and Risk Analysis (RERA) Toolkit .	This Toolkit supports a Rapid Education and Risk Analysis (RERA) that examines the education sector, learners, and their communities as a dynamic system of multiple contextual risks and assets. It investigates how contextual risks, such as violence, insecurity, natural hazards, and health pandemics, impact education; how education influences these risks; and how these risks influence each other.
USAID. (2013). Checklist for Conflict Sensitivity in Education Programs	This resource includes useful information on designing and delivering educational programs in conflict-affected area that is relevant to EGR programming and the language issues discussed in this resource. It includes specific information on teaching and learning resources.
INEE. (2013). Guidance Note on Conflict Sensitive education .	This resource provides strategies for developing and implementing conflict sensitive education (CSE) programming and policies.
INEE. (2010). Guidance Notes on Teaching and Learning .	Shares good practice on issues related to curricula adaptation and development; teacher training, professional development and support; instruction and learning processes; and the assessment of learning outcomes. Identifies approaches and tools to help address the complex issues surrounding curriculum assessment, development, monitoring and evaluation in contexts affected by crisis.

Resource	Summary
Education Above All. (2012). Conflict-Sensitive Education Policy: A Preliminary Review .	Offers technical planning advice for high-level policy makers in ministries of education and donors in situations of conflict, recovering from conflict, or at risk of it; shares experience on how education policies, including those related to language of instruction, may contribute to continuing tensions and conflict, or help reduce these tensions.
Cost issues	
USAID. (2018). Cost Reporting Guidance for USAID-Funded Education Activities . USAID. (2018). Annexes for Cost reporting guidance for USAID-funded education activities .	These USAID resources support programs in reporting and understanding costs of education activities.
UNICEF, 2016. The Impact of Language Policy and practice on children's learning: Evidence from Eastern and Southern Africa . UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section.	Includes a section on cost considerations.
Vawda, A. Y., & Patrinos, H. A. (1999). Producing Educational Materials in Local Languages: Costs from Guatemala and Senegal . <i>International Journal of Educational Development</i> , 19, 287–299.	Examines production costs of local-language materials, budgetary implications of such programs, and cost-saving strategies that have and can be usefully employed in Guatemala and Senegal. The analysis and lessons can be used to inform language planning for education in other countries.
Heugh, K. (2011b). Cost Implications of the Provision of Mother-Tongue and Strong Bilingual Models of Education in Africa . In A. Ouane, & C. Glanz (Eds.), <i>Optimising learning, education and publishing in Africa: The language factor</i> (pp. 255–289).	This article explains cost implications of providing L1-based and bilingual education in Africa. The issues discussed are applicable across regions.
Section 3.2 – Instruction & Assessment	
Barnes, A. & Pallangyo, A. (2019, July 17). Key Early Grade Reading Skills and Strategies for Effective Instruction and Assessment . [webinar]. REACH/Global Reading Network.	This webinar and training module, part of a series, provides detailed information on the critical early grade reading and writing skills children need to learn, as well as strategies and activities for effectively teaching and assessing them. Language-specific issues related to EGR skills and instruction are discussed. A recording of the webinar and a downloadable package of resources are available.

Resource	Summary
Kim, Y.-S. G., Boyle, H. N., Zuilkowski, S. S., & Nakamura, P. (2016). Landscape Report on Early Grade Literacy . Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.	Developed by Reading within REACH, this report reviews and summarizes available empirical evidence on early grade literacy acquisition and instruction in developing countries
Global Reading Network. Videos on early grade reading skills and instruction .	These videos feature teachers teaching a variety of reading skills in multiple languages. Videos from Ghana and Jordan demonstrate the difference between fluent and non-fluent readers. These videos are useful to show policy makers, teachers, and other stakeholders in a variety of settings.
Kim, Y.-S. G., & Davidson, M. (2019). Promoting Successful Literacy Acquisition through Structured Pedagogy . Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.	Presents principles of structured pedagogy in teaching, describes what structured pedagogy is and is not, and discusses frequent challenges in implementing these principles in international contexts.
Kim, Y.-S. G., & Davidson, M. (2019). Assessment to Inform Instruction: Formative Assessment . Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.	The purpose of this resource is to provide an overview of assessment <i>for</i> learning, commonly called formative assessment. The resource includes a review of key aspects of formative assessment relevant to literacy development, including types of formative assessment, their links to the instructional decision cycle, and requisite features of quality formative assessment. The resource then presents specific guidance and information for successfully implementing formative assessment as part of effective literacy instruction.
Trudell, B., & Schroeder, L. (2007). Reading Methodologies for African Languages: Avoiding Linguistic and Pedagogical Imperialism . <i>Language, Culture and Curriculum</i> , 20 (3), 165–180.	This paper discusses the importance of aligning reading methodologies to the linguistic characteristics of African languages.
Schroeder, L. (2013). Teaching and Assessing Independent Reading Skills in Multilingual African Countries: Not as simple as ABC . In C. Benson & K. Kosonen (Eds.), Language issues in comparative education: Inclusive teaching and learning in non-dominant languages and cultures (pp. 245–264). Rotterdam, The Netherlands: Sense Publishers.	This chapter examines certain reading theories and resulting instructional practices with African linguistic and orthographic characteristics in mind to identify potentially effective pedagogical strategies for African readers.

Resource	Summary
Instruction for all children	
Hayes, A., Turnbull, A., Moran, N. (2019). Universal Design for Learning to Help All Children Read: Promoting Literacy for Learners with Disabilities . Produced for Reading within REACH and the U.S. Agency for International Development (USAID).	The Toolkit provides evidence-based research and information on effective teaching techniques to support all children's literacy acquisition. Specifically, the toolkit describes: the phases of literacy for students with disabilities; supports and services that can be used to gain literacy skills; specific instructional techniques using the framework of UDL; and suggestions to monitor students' progress.
Laurent Clerc National Deaf Education Center (n.d.) Everything You Always Wanted to Know About An ASL/English Bimodal Bilingual Approach .	Outlines a bilingual approach using the American Sign Language and English language pairs.
Deaf-Blind Network Literacy Work Group. (2014). Steps to Literacy .	This one-page brief summarizes key phases of literacy development relevant to all children.
All Children Reading – A Grand Challenge for Development. Sign on for Literacy . Innovators supporting literacy for deaf children can be found here .	To improve sign language access and learning outcomes for deaf children in low-resource contexts, ACR-GCD launched the "Sign on for Literacy" prize.
Hayes, A. M., Dombrowski, E., Shefcyk, A. H., and Bulat, J. (2018). Learning Disabilities Screening and Evaluation Guide for Low- and Middle-Income Countries .	This guide provides an introduction to learning disabilities and describes the processes and practices that are necessary for the identification process. It also describes a phased approach that countries can use to assess their current screening and evaluation services, as well as determine the steps needed to develop, strengthen, and build systems that support students with learning disabilities.
Section 3.3 – Resources for Teaching and Learning	
General/Comprehensive resources on this topic	
Pallangyo, A., Pflapsen, A., & Lyimo, A. (2019, July 10). Resources for Teaching and Learning Early Grade Reading . [webinar]. In <i>Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success Training Series</i> . Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No. AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T.	This webinar and training module, part of a series, provides detailed guidance on the development and use of EGR teaching and learning materials. The webinar and associated resources include: an overview of materials commonly used to teach EGR; a detailed overview of the materials development process; examples of EGR materials in various languages; and current best practices for developing materials in multiple languages. A recording of the webinar and a downloadable package of resources are available.

Resource	Summary
Materials inventory and review	
RTI International (2014). Nigeria Reading and Access Research Activity: Review of existing reading materials to support Hausa literacy instruction	This resource describes the process and tools used by one EGR program to review and inventory existing early grade reading materials. The resource includes a tool used to review materials and a report on what the review found, which could be adapted for use in other contexts.
RTI International. (2016). Survey of Children's Reading Materials in African Languages in Eleven Countries	The survey includes a detailed description of the current supply of EGR materials in African languages in the following 11 countries in sub-Saharan Africa: The Democratic Republic of the Congo (DRC), Ethiopia, Kenya, Malawi, Mali, Mozambique, Nigeria, Senegal, Tanzania, Uganda, and Zambia.
Materials development	
Davidson, M. (2013). Books that Children CAN read: Decodable Books and Book Leveling . JBS International.	This resource provides detailed information on how to create decodable and leveled books for primary grade learners. It discusses methods for book creation and describes issues to consider when developing books for beginning readers.
Developing Effective and Appropriate Decodable and Leveled Books . (April 2019). Presentations from three USAID programs on developing decodable and leveled books.	GRN-organized panel presented at the annual conference of the Comparative and International Education Society (CIES) shares experiences and lessons learned developing books from three USAID early grade reading programs.
Enabling Writers Workshop Program . (2016). General Program Guide, Language Set-up Guide, Field Testing Toolkit and Program Evaluation Toolkit	The Enabling Writers Workshop program, implemented by Reading within Reach (REACH), used the Bloom software to support locally produced books for early grade readers. Four resources developed by the program on how to develop decodable and leveled books are available.
Robledo, A. & Pflepsen, A. (2016). Developing Materials to Support Early Grade Literacy in Hausa in Northern Nigeria: Considerations, Processes and Reflections . Presented for the Global Reading Network.	This resource describes issues to consider from a content and design perspective when designing early grade reading materials.
Boakye-Yiadom, F., Matthews, M., Miksic, M., & Trudell, B. (2018). Developing Early Grade Reading Materials in 11 Languages: Learning in Ghana . Presented at the annual conference of the Comparative and International Education Society (CIES). Mexico City, Mexico.	This suite of presentations describes how the USAID Ghana Learning program developed early grade reading materials in 11 languages in Ghana. The presentations share challenges and guidance, as well as tools.

Resource	Summary
<p>Annex H. Lesson plan template – Example 1</p> <p>Annex I. Lesson plan template – Example 2</p> <p>In <i>Handbook on Language of Instruction Issues in Reading Programs</i> (2019).</p>	<p>This fillable template was developed by FHI 360 to support the development of reading materials in 11 languages in Ghana. The template is designed to support quality control. <i>Note: The template is language- and context-specific and would need to be updated. It is provided to illustrate a tool that can be used to support materials development across languages.</i></p>
<p>Blankenbeckler, C. (2018). More than Stories: Developing Decodable and Leveled Texts in Mozambique. Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico.</p>	<p>This presentation describes how an early grade reading program in Mozambique developed decodable and leveled texts to support bilingual reading instruction.</p>
<p>Malone, S. (2013). Resource for Developing Graded Reading Materials for Mother Tongue-Based Education Programs (4th ed.). SIL International.</p>	<p>Describes a process and puts forth guidelines for developing reading materials in local languages, depending on the stages of literacy.</p>
<p>RTI International. (2015). A guide for strengthening Gender Equality and Inclusiveness in Teaching and Learning Materials. Washington, D.C.: U.S. Agency for International Development.</p> <p>An Asia-specific version is also available.</p>	<p>Provides guidance on how to develop and evaluate materials that are free of bias and that promote equality and inclusiveness of all marginalized, disadvantaged, and underrepresented groups.</p>
Organizations that support materials development	
<p>blueTree Group</p>	<p>This organization provides technical assistance on the book chain process, including procurement specifications, printing, and support to local printers, among other topics.</p>
<p>Mango Tree</p>	<p>This organization, which is based in Uganda, produces a variety of reading and learning materials in multiple languages, as well as sells them online.</p>
<p>Global Book Alliance</p>	<p>The Global Book Alliance is a partnership of donor agencies, multilateral institutions, and civil society organizations that are committed to bringing books to every child in the world by 2030. “Flagship” activities include the Global Digital Library, a publishing collaborative, and the Global Book Campaign.</p>

Resource	Summary
Software and other tools to support materials development and instruction	
Bloom Bloom training materials	<p>Developed by SIL LEAD through the All Children Grand Challenge for Development initiative (funded by USAID, World Vision and DFAT), Bloom provides simple, free templates and shell books to facilitate the production of reading materials (including decodable and leveled books) and other education resources in multiple languages. Bloom was designed to be accessible to those with minimal training, to support the timely production of early grade reading resources.</p> <p>The Bloom Library contains books that have Creative Commons licenses and can be downloaded and adapted. Books can also be submitted for inclusion in the Bloom library.</p> <p>Guides and videos on how to install and use Bloom software are available in English, French and Spanish.</p>
SynPhony	<p>Easy-to-use software that analyzes language (from a corpus of uploaded text) and produces controlled words lists (among other features) to aid in the development of reading materials. The software has been used to support language analysis for multiple USAID EGR reading programs. Contact Norbert Rennert at nrennert@gmail.com</p>
PrimerPro	<p>Freeware that analyzes language (from a corpus of uploaded text) and helps facilitate the development of reading materials.</p>
iLoominate	<p>A free app (for use on Android devices) for producing children's books on- or offline. Has examples in English, Spanish and Haitian Creole.</p>
Papaya software Ethiopia example Uganda example	<p>This software application supports language-specific instruction and has been used in several USAID-supported early grade reading programs.</p>
SIL resources	<p>SIL's website hosts a variety of software programs, fonts, and information on scripts that can support the development of teaching and learning materials.</p>

Resource	Summary
SIL LEAD	SIL LEAD provides resources, including software and human resources, to support materials development across languages.
Digital libraries	
Book Dash	This South African initiative focuses on creating high-quality, low-cost children's books that anyone can freely translate and distribute. The books are licensed to allow anyone to freely translate and distribute. The library includes PDF e-books, as well as PDF print-ready files and some audiobooks
Global Digital Library	An initiative of the Global Book Alliance (GBA), the GDL collects existing high-quality, open educational reading resources and make them available via the web, on mobile devices and for print. The GDL currently provides books in 15 languages, with a goal of 25 languages by the end of 2018, and 100 by the end of 2020. It will also facilitate translation and localization of resources to more than 300 languages
Let's Read!	An initiative of The Asia Foundation's Books for Asia program that fosters young readers in Asia. Let's Read! includes high-quality children's stories in national and indigenous languages, with a focus on underserved languages. The library includes "Girls Can do Anything" and STEM collections.
StoryWeaver	An initiative of Pratham Books, StoryWeaver is a digital library of more than 6,000 stories in 104 languages, from India and elsewhere. All stories and illustrations are available under open licenses to give people the right to share, use, translate or build upon the creative work that is available. Stories can be downloaded for printing, or for adaption in an e-publication software
African Storybook	African Storybook, an initiative of the non-profit organization Saide, aims to address the shortage of contextually appropriate books for early reading in the languages of Africa by supporting the creation, adaptation and translation of stories for early reading. The website includes openly licensed stories and illustrations available for download.

Resource	Summary
Open licensing of materials	
<p>Global Reading Network. (June-August 2019). Webinar series on open licensing.</p> <ul style="list-style-type: none"> • Creative Commons Basics (April 2019) • Open Licensing Business Models for Publishers of Children's Books and other Learning Materials (June 2019) • Approaches to Open Licensing for Early Grade Reading Materials (August 2019) 	<p>This three-part webinar series provides information on open licensing of education materials, in particular early grade reading materials developed with U.S. government funding. Webinar 1 provides an overview of Creative Commons licenses. Webinar 2 describes open licensing business models and is aimed at creators and publishers of children's literature who are exploring the benefits, possibilities, challenges, and limitations of an open licensing business model. Webinar 3 discusses open licensing within the context of early grade reading improvement efforts supported with U.S. government funding.</p>
<p>Cozzolino, S. and Cable, G. (2019). Open Licensing of Primary Grade Reading Materials: Considerations and Recommendations. Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.</p>	<p>The objective of this guidance note is to provide information on open licensing to the diverse stakeholders involved in early grade reading improvement initiatives, particularly those supported by USAID. The resource is designed to assist relevant parties—including host-country governments, donor staff, implementing partners, publishers and others—throughout the process of planning for and applying Creative Commons licenses</p>
<p>Butcher, N., Levey, L., and von Gogh, K. (2018). Open Licensing Made Plain: A Primer on Concepts, Challenges, and Opportunities for Publishers</p>	<p>This primer on open licensing for African publishers describes issues to consider when considering the use of open licensing in early literacy initiatives.</p>
Section 3.4 – Teachers and Teaching	
<p>Pallangyo, A. & Pflepsen, A. & (2018, July 30). Continuous Professional Development in Early Grade Reading Programs. [webinar and resource materials]. In <i>Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success Training Series</i>.</p>	<p>This webinar, part of a 5-part series, includes an overview of the knowledge and skills EGR actors need to have and considerations when planning, implementing, monitoring and evaluating continuous professional development for teachers and educators. The second half of the webinar focuses on coaching. A package of downloadable resource materials s included along with the webinar.</p>

Resource	Summary
Pflepsen, A. (2018). Coaching in Early Grade Reading Programs: Evidence, Experiences and Recommendations . Prepared by University Research Co., LLC. (URC) under the Reading within REACH initiative.	This resource summarizes research on teacher coaching, describes recent early grade reading program experiences with coaching, and provides guidance on key aspects of coaching. It is designed to be informative and accessible to the diversity of organizations and individuals involved in the design, implementation, evaluation and scale up of early grade reading coaching initiatives.
Global Reading Network. (2019). Coaching to improve early grade reading: Emerging evidence on effectiveness and sustainability . Panel presented at the annual conference of the Comparative and International Education Society (CIES).	This panel features three presentations about coaching in early grade reading programs, in Kenya, Madagascar and Senegal.
Teacher Knowledge, Skills and Attitudes (KSA) Related to Literacy and Language that Influence Early Grade Literacy Outcomes in Sub-Saharan Africa. (Forthcoming). USAID.	This report examines teachers' language and literacy skills; teacher pedagogical knowledge and skills; and teachers' attitudes and beliefs towards local language instruction within the context of early grade reading improvement initiatives in sub-Saharan Africa.
The Philippines Department of Education (DepEd)	The Philippines DepEd has produced various documents outlining the need for teachers to be proficient in mother tongue-based multilingual education instructional practices to be able to implement the country's curriculum and learner needs.
Florida State University and Creative Associates (2018), Literacy Skills in the Primary School: A Graduate Certificate Course for Teacher Educators, Researchers and National Stakeholders . (See Handout 5 for excerpt. Full course materials forthcoming on DEC.)	This graduate-level course was developed and delivered by Florida State University and Creative Associates International as part of the Nigeria Northern Education Initiative (NEI) Plus. The course was designed for teacher educators, researchers and national stakeholders to build their expertise in the design, delivery, monitoring and assessment of reading programming.
Creative Associates International. Introduction to Teaching Early Grade Reading in P1-P3 . [student teacher resource book].	This resource, develop as part of the Nigeria Northern Education Initiative (NEI) Plus, is designed for student teachers participating in pre-service training.
Pouezevara, S., ed. (2018). Cultivating Dynamic Educators: Case Studies in Teacher Behavior Change in Asia and Africa . RTI Press.	The book includes case studies from seven countries-- Ethiopia, India, Indonesia, Malawi, Nigeria, Philippines and Zambia--describing different approaches to teacher behavior change, including workshop-based training and coaching. The case studies feature USAID reading programs.

Resource	Summary
Section 3.5 – Communication, Advocacy and Support	
Annex A , <i>Advantages of instruction in languages children speak, use and understand: A summary of the evidence</i> . In <i>Handbook on Language of Instruction Issues in Reading Programs</i> (2019).	Summarizes key evidence on the advantages of reading instruction, and instruction across the curriculum, in languages that learners and their teachers speak, use and understand best.
UNESCO. (2018). Advocacy Kit for Promoting Multilingual Education: Including the Excluded . MTB-MLE Resource Kit. Bangkok, Thailand: UNESCO Asia and Pacific Regional Bureau.	This resource shares research findings and experiences implementing mother tongue-based multilingual education in the Asia region. The resource is organized into sections geared towards policy makers, education program planners and practitioners, and community members. Each section includes evidence, case studies and lessons learned and recommendations.
Cao, Y., Ramesh, A., Saffitz, G., Hosein, E., Menendez, A., Davaratna, V. (2014). Designing Behavior Change Communication Interventions in Education: A Practitioner's Guide NORC.	This resource is designed to provide education practitioners with information and guidance on how strategic communications can be used to promote certain behaviors among specific target audiences to improve education outcomes.
RTI International. (2016). Social and Behavior Change Communication (SBCC) Research in Senegal: Final Report	This report shares findings from a social and behavior change communication pilot aimed at increasing parental and community awareness and support for early grade reading. The report includes detailed information about the components of the SBCC initiative.
RTI International. (No date.) Results of Social and Behavior Change Communication Pilots in Senegal and Malawi .	This brief provides a summary of the results of two early grade reading social and behavior change communications pilot initiatives, conducted in Senegal and Malawi.
RTI International. (2018). Social and Behavior Change Communication to Increase Parental Engagement in Children's Reading Practice	This report presents the results of a social and behavior change communications activity conducted through the USAID/Uganda Literacy Achievement and Retention Activity (LARA). The purpose of the communication campaign was to improve parent's engagement in their children's reading practice at home.

Resource	Summary
RTI International (2014). Seminar: Communication for Behavior Change to Support Early Grade Reading	This resource includes a presentation and background materials used during a seminar on SBCC. The agenda for this SBCC Seminar, delivered in May 2014, was: Part 1: What is Social and Behavior Change Communication? Part 2: What is the history and theoretical basis for SBCC? Part 3: What is the best way to develop a SBCC Strategy?
Mother Tongue-Based–Multilingual Education (MTB-MLE) Network and RTI International. (2011). Improving Learning Outcomes Through Mother Tongue-Based Education [brief]. Research Triangle Park, NC: MTB-MLE Network and RTI.	This four-page brief provides an overview of the benefits of mother tongue-based education, as well as key considerations for developing L1-based bilingual and multilingual education programs. The document answers frequently asked questions about language of instruction and contains useful “talking points” for advocacy around L1-based instruction.
Ouane, A., & Glanz, C. (2010). Why and How Africa Should Invest in African Languages and Multilingual Education. An Evidence- and Practice-Based Policy Brief. Hamburg: UNESCO Institute for Lifelong Learning (UIL).	Addresses several core questions about MTB-MLE in sub-Saharan Africa, including the impact of MTB-MLE on social and economic development, the potential of African languages for education, how to handle the reality of multilingualism effectively for lifelong learning for all, why teaching in the mother tongue is beneficial for students’ performance, what kind of language models work best in Africa, is MTB-MLE affordable, and under what conditions do parents and teachers support mother-tongue-based education.
Section 3.6 – Monitoring, Evaluation, Research and Learning	
USAID 2019 Education Indicator Guidance	This website includes a comprehensive set of resources on USAID education indicators, including definitions, descriptions and guidance on reporting.
USAID Education Reporting Guidance	This guidance addresses changes to USAID education reporting that take effect in 2019. The resource describes new and revised education indicators and disaggregates.

Resource	Summary
USAID Indicator Toolkit	This toolkit contains a complete listing of resources available related to changes to USAID education reporting that take effect in 2019. These changes are a direct response to two key documents published in 2018: USAID Education Policy and the U.S. Government Strategy on International Basic Education (USG Education Strategy). As a result, the Office of Education has updated its reporting requirements, including its education-related indicators and Key Issue Narratives, to support reporting on the Education Policy and USG Education Strategy and to facilitate internal learning.
USAID Monitoring Toolkit	This Toolkit curates the latest USAID Program Cycle guidance, tools, and templates for monitoring USAID strategies, projects, and activities. Designed for USAID staff members and external partners who manage or implement USAID efforts, it complements USAID's Program Cycle Operational Policy (codified in ADS 201) and is regularly updated to make sure content is current and consistent with policy requirements.
USAID Evaluation Toolkit	This Toolkit curates the latest USAID guidance, tools, and templates for initiating, planning, managing, and learning from evaluations. The resource is designed for USAID staff members and external contractors who participate in or conduct evaluations for USAID.
Collaborating, Learning and Adapting	This USAID website provides information how to apply project information and findings. The purpose of these resources is to make CLA more systematic and intentional throughout the Program Cycle.
Hertz, A. C., Kochetkova, E., and Pflapsen, A. (2019). Classroom Observation Toolkit for Early Grade Reading Improvement . Prepared by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.	This Toolkit provides information and guidance on using classroom observation to support reading improvement initiatives. It includes recommendations as well as templates for observation tools for different purposes.

Resource	Summary
UNESCO (2019). Global Proficiency Framework for reading and mathematics in grades 2-6	The GPF articulates a global consensus of the minimum skills and competencies learners should be able to demonstrate at key points along their learning trajectory. The purpose is to provide detailed proficiency expectations that countries and national and regional assessment organizations can use to link existing reading and math assessments to Sustainable Development Goals 4.1.1(a) and (b): Proportion of children and young people: (a) in grades 2/3; (b) at the end of primary achieving at least a minimum proficiency level in (i) reading and (ii) mathematics, by sex.
<i>See specific language-related research articles and resources mentioned in the Toolkit for examples and ideas</i>	
Section 3.7 – Policies, Standards and Planning	
Policy	
Bruckner, S. & Ocampo, D. (2018, March 7). Basa Pilipinas Support to DepEd's MTB-MLE Policy Reform . [Webinar]. In <i>Language Policy, Planning and Practice in EGR Programs</i>	This presentation shares experiences from the USAID-supported Basa Pilipinas project, including how the project collaborated with the Department of Education to support the implementation of a new language of instruction policy in more than 3,000 schools with 15,700 teachers and 1.6 million children.
Creative Associates International. (2017). Improving the Teaching of Early Grade Reading and Transition to English and Providing Enough Instructional Time for Children to Learn to Read .	These briefs are examples of how one USAID-supported early grade reading program, in Northern Nigeria, shared information and raised awareness about reading and language of instruction issues.
Language Policy, Planning and Practice in EGR Programs . (2018). [webinar.] Global Reading Network.	This series of three presentations shares the experiences of three USAID-supported reading programs in Ethiopia, Nepal and Philippines and how they worked closely with government on language issues.
United Nations Children's Fund (UNICEF) (2016). The impact of language policy and practice on children's learning: Evidence from Eastern and Southern Africa . UNICEF Eastern and Southern Africa Regional Office (ESARO), Basic Education and Gender Equality (BEGE) Section.	For information on existing language of instruction policies in Eastern and Southern Africa

Resource	Summary
UNESCO. (2010). Policy guide on the integration of African languages and cultures into education systems , amended and adopted by the ministers of education at the African Conference on Integration of African Languages and Cultures into Education, Ougadougou, Burkina Faso, 20–22 January 2010. Tunis: Association for the Development of Education in Africa (ADEA); Hamburg: UNESCO Institute for Lifelong Learning.	Urges all stakeholders to uphold the conference's recommendation that multilingual and multicultural education should be the default approach to basic education in African countries.
Pinto, C. (2018). Negotiating Language Complexities and Government Policies for Khmer instruction . Presentation at the annual conference of the Comparative and International Education Society (CIES). Mexico City, Mexico.	This presentation shares information about the challenges and lessons learned from Room to Read's experience developing a new approach to reading instruction for the Khmer language for grades 1 and 2 in Cambodia. It describes how the program conducted an orthography analysis and worked with government to pilot a new approach reading instruction appropriate for the language.
Save the Children. (2010). Language and children's education [Policy brief]. London, UK: Save the Children.	Summary of key statistics, research, and guidance on language use in education, for advocacy.
Standards	
UNESCO. (2019). Global Proficiency Framework: Reading and Mathematics , Grades 2-6.	The Global Proficiency Framework, developed in collaboration with UNESCO, USAID and others, provides common proficiency standards to help countries set internationally comparable benchmarks for reading and mathematics achievement in grades 2 through 6. The GPF is a useful resource to support reading improvement initiatives in identifying performance standards against which benchmarks can be developed for specific languages.
Global Reading Network. (2018). Early Grade Reading Benchmarks: Methods, Experiences and Future Directions . [webinar.]	This resource includes a recording of presentations and discussion around methods for identifying early grade reading benchmarks, and experiences and outcomes to date using them. The three-hour event included a conversation on the needs of practitioners and policymakers who are developing and using benchmarks, and future directions for research, analysis and application.

Resource	Summary
<p>Room to Read. (2018). Guidance Note: Setting Data-Driven Oral Reading Fluency Benchmarks</p> <p>Room to Read. (2018). Data Driven Methods for Setting Reading Proficiency Benchmarks</p>	<p>These companion resources provide an in-depth overview of methodologies for establishing reading benchmarks.</p>
<p>Maldonado, S. & Rosales, L. (2018). Learning to read... expected and actual trajectories. A longitudinal study of children in Guatemala.</p>	<p>This brief shares the results of research on student achievement vis-à-vis learning standards.</p>
Planning	
<p>Gove, A., Korda Poole, M., & Piper, B. (2017). Designing for Scale: Reflections on Rolling Out Reading Improvement in Kenya and Liberia. In A. Gove, A. Mora, & P. McCardle (Eds.), <i>Progress Toward a Literate world: Early Reading Interventions in Low-Income Countries</i>, New Directions for Child and Adolescent Development, 155, 77–95.</p>	<p>This paper describes how two USAID-supported early grade reading programs expanded their efforts nationally, including lessons learned and considerations for other programs.</p>
<p>Pallangyo, A., & Pflepsen, A. (2019, June 25). Early grade reading programming: From conception to scale. [Webinar]. In <i>Early Grade Reading Program Design and Implementation: Best Practices and Resources for Success</i> Training Series. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within Reach (REACH) initiative.</p>	<p>This webinar and training package, part of a series, guides participants through key steps and considerations for EGR program design and implementation, with a focus on planning for expansion and sustainability. The sessions will include an update on progress improving EGR outcomes and the new U.S. Government strategy and USAID policy for improving education quality. A recording of the webinar and a downloadable package of resources are available.</p>

Annex D. Conducting a language-specific situation analysis: Key steps to take and information to gather

Prior to conducting the situation analysis:

- Identify a team of people to work together on the design and implementation of the situational analysis
- Determine specific objectives of the situational analysis and information to gather
- Follow ethical standards for research/data collection
- Develop and pilot data collection instruments, as needed, to verify instruments are gathering the information needed
- Obtain approval for data collection and instruments, as appropriate (note that an Institutional Review Board (IRB) associated with the organization conducting the data collection and/or an institution appointed by the Ministry of Education may need to review the instruments and data collection plan, determine in advance what needs to be done and how long the process may take)

Note: The questions below align with those included in USAID's Literacy Landscape Assessment Guidebook.

Step to take and why	Information sources to gather	Reflection questions	Outcomes
1. Understand sociolinguistic context. Purpose: <ul style="list-style-type: none"> • Identify languages and dialects spoken in the target geographic area to help identify which languages should potentially be used for (reading) instruction. • Understand children's language and reading proficiency to inform understanding of current reading and education outcomes; identify need to potentially use additional languages, dialects; and to inform content and instructional approaches. 	<ul style="list-style-type: none"> • Reliable and current information about what languages and dialects are spoken and used in the country and in which geographic areas. Such information may be found in national demographic data, but more accurate and current information is likely to be found in a report on a language mapping exercise. Section 3.1X provides more information on language mapping. 	<ul style="list-style-type: none"> • What languages and dialects are spoken in the country, where, and by what percentage of the population? • What percentage of the population uses the official languages of instruction as their L1 or home language? • Are some languages not used as official LOI, and if so, what is the effect on children's access, learning outcomes and retention? (See additional questions in step 5 related to this issue.) • What is children's proficiency level in languages used for reading instruction and instruction across the curriculum? 	<ul style="list-style-type: none"> • Knowledge of the languages and dialects spoken and used by the target population • Knowledge of approximately what percentage of people, particularly children, speak and use the different languages and dialects • Understanding of children's proficiency level in the languages used for instruction, as well as languages (and dialects) that may not currently be used for instruction

Step to take and why	Information sources to gather	Reflection questions	Outcomes
<p>2. Learn about the country's language-related goals, policies and experiences.</p> <p>Purpose:</p> <ul style="list-style-type: none"> Understand a country's policies for language use in the education system, including for instruction, teacher professional development, and teacher school assignment. Understand the country's goals in terms of language and learning outcomes. Understand the country's past and current experience specific to LOI policy, organizations involved in language-related education work, and successes and challenges with respect to language and education issues. 	<ul style="list-style-type: none"> Official government documents on LOI; such documents may include the Constitution or documents developed by a ministry of education or other relevant institution Documents related to teacher preparation and teacher school assignment Reports and articles on previous experiences related to LOI and language use for education Interviews with people involved in past efforts to become familiar with the country's current situation and history with language-related policies and practice in education. 	<ul style="list-style-type: none"> What are the access, equity, and learning goals of the primary education system? Are they language-specific? How might the language(s) used for instruction affect the attainment of these goals? Is there a language of instruction policy? If yes, what languages are mandated to be used for instruction, in which grades and for what purposes? If no, what official guidance do teachers rely on to determine what language(s) to use for instruction? Does LOI policy allow local government jurisdictions to make decisions about LOI at the sub-national or school level? In what languages are children taught to <i>read</i>? What languages are taught <i>as subjects</i>? What languages are used for teaching <i>curricular subjects</i>? Is there alignment between the languages children learn to read and the languages in which they learn curricular content? Based on the policy, at what grade level are children expected to begin learning an L2/Lx? Does LOI policy (or practice) differ for children not in the formal government school system? If so, how and to what effect? What country- or region-specific policies and laws guide education for refugee or internally displaced children? How does language factor in? What takes place in practice in terms of the language(s) used for instruction for refugee or internally displaced populations? What policies provide guidance on the use of sign language for instruction? What takes place in practice in terms of providing instruction to children who are deaf and hard of hearing? What is the policy for language use for teacher training? Does it align with the LOI policy and the languages teachers are expected to teach children to read and to learn in? What is the policy for teacher school assignment? Does it take into consideration teachers' language proficiency? What is the effect of the current policy? 	<ul style="list-style-type: none"> Knowledge of current LOI policy for children in formal schools and other educational settings Knowledge of language-related policies (or practices) regarding language use for teacher training Knowledge of language-related aspects of policies and practices related to school assignment Understanding of how education-related policies are modified Knowledge of country's history with respect to LOI, organizations that have been engaged in language and education issues

Step to take and why	Information sources to gather	Reflection questions	Outcomes
		<ul style="list-style-type: none"> If needed, what is the process for modifying existing policies affecting language use in education and who needs to be involved? 	
3. Understand language-related issues at the school level. Purpose: <ul style="list-style-type: none"> Understand how language-related policies are being implemented in practice. Understand the school context in terms of language use and learning. 	<p>While anecdotal information may be available, take a systematic approach to understand what is currently happening in classrooms. Gather evidence through:</p> <ul style="list-style-type: none"> Observations focused on language use in classrooms, teacher instructional practices and how time is used Interviews/surveys of teachers, students and school administrators Observations and information gathered at teacher training institutions. This may include gathering course syllabi, observing teacher training, and interviewing instructors to find out how languages are used. 	<ul style="list-style-type: none"> What languages are used for reading instruction, for teaching languages as subjects, and for teaching curriculum content (e.g., math)? How much time is allocated, and actually used, for reading instruction? How much time is allocated and used for teaching the L2/Lx as a subject? What languages do children use to communicate with each other? Are these different or the same as the languages used by their teachers? What is the extent of the “teacher-student language match”? To what extent are schools/classrooms multilingual? How do teachers provide instruction in multilingual classrooms and to what effect? In what languages do teachers receive training? Does the approach align with any policies on teacher training? What do language-related professional development do? 	<ul style="list-style-type: none"> Knowledge of how LOI policy is or is not implemented in practice Knowledge of what languages are used for teacher training Understanding of the role that teachers' language proficiency plays in school assignment
4. Analyze curriculum, standards, instructional approach and delivery. Purpose: <ul style="list-style-type: none"> Gather information about the existing curriculum and approaches to instruction to inform improvements to curriculum, development of teacher guides, and target areas for teacher professional development. 	<ul style="list-style-type: none"> Reading and language curriculum and standards for relevant grades and languages; curriculum for languages taught as subjects Teacher guides or other reference materials describing instructional approaches to be used Assessment instruments Reports or data from observations of classroom instruction focused on instructional approaches and content of reading and language lessons Sample of teacher lesson plans, if relevant 	<ul style="list-style-type: none"> Does the curriculum specify when and how to use specific languages for reading instruction, for teaching languages as a subject, and for teaching subject content? What proficiency standards and benchmarks currently exist for the languages used for reading instruction? Were the standards developed using the Global Proficiency Framework as reference? Were benchmarks identified using a policy linking approach? What are current instructional approaches and practices for teaching reading? Are they appropriate for the specific languages being taught? What instructional methods are used to teach children an L2 or other additional languages? Do approaches for teaching reading and language align with evidence -based best practices for language and reading instruction? Do these approaches align with official policies and guidance on how to teach? 	<ul style="list-style-type: none"> Knowledge of the existing curriculum Be knowledgeable about the existing curriculum for reading and language instruction to identify potential areas for improvement. Understand current instructional practices (strengths, weaknesses) to inform lesson plans and identify areas for teacher professional development.

Step to take and why	Information sources to gather	Reflection questions	Outcomes
		<ul style="list-style-type: none"> • In contexts where the LOI changes, how long are children provided with instruction in the different languages used for instruction? When and how are students expected to transition from one LOI to another? Do children continue to develop their L1 skills after the L2/Lx is introduced? Do children continue to learn content and to be assessed in the L1, or is its use discontinued? What is the effect of the current approach on children's learning outcomes? • In what languages are students assessed, and do these languages align with the languages children are learning to read? To learn in? Do multilingual assessments exist? • How much time do teachers <i>actually</i> spend teaching language and reading? What is the content and quality of this instruction? How does the amount of time, content and quality of instructional time facilitate or hinder children's ability to learn to read, to learn an additional language, and to learn academic content? 	
<p>5. Analyze education access, equity and learning outcomes vis-à-vis language.</p> <p>Purpose:</p> <ul style="list-style-type: none"> • Understand how LOI policies, languages used for reading instruction, or other language-related policies and practices affect equitable education access and learning outcomes. 	<ul style="list-style-type: none"> • Data on enrollment, repetition and drop-outs by relevant geographic areas (and by school, if available) • Learning outcomes from assessments such as PIRLS, EGRA, TIMSS, ASER or other country-specific learning assessments, along with demographic information (e.g., students' geographic location and home language) 	<ul style="list-style-type: none"> • What are current education access outcomes? Do they vary by geographic area or home language? • Do children who are deaf or hard of hearing have access to quality instruction in sign language? • Do children affected by conflict and crisis have access to quality instruction in the languages they use and understand best? • What are current learning outcomes with respect to reading and learning achievement, as measured by EGRA or other national and international assessments? Does achievement differ by geographic area, home language, whether the language being used is an L1 or Lx, whether a child communicates via sign language, or other characteristic (e.g., refugee status)? • Are access and achievement equitable across geographic areas, language groups (e.g., ethno-linguistic group, home language used, signed and spoken languages, etc.), girls and boys, and between various populations, such as refugee 	<ul style="list-style-type: none"> • Understanding of current education access, equity and learning outcomes that can be used to inform improved approach to instruction • Knowledge of whether children from certain regions and sociolinguistic groups may be at a disadvantage due to the official LOI, languages used for reading instruction, or other factors

Step to take and why	Information sources to gather	Reflection questions	Outcomes
		<p>children or others affected by conflict or crisis, and children with differing abilities, etc.?</p> <ul style="list-style-type: none"> How is children's reading and language proficiency assessed at different levels (international, national, classroom)? Do national or regional assessments exist in different languages? Are the assessment methods and instruments appropriate for the languages and the purpose of the assessment? Are assessments appropriately designed for students learning in their L1 and those learning in their L2/Lx? 	
<p>6. Understand teacher knowledge, skills and needs.</p> <p>Purpose:</p> <ul style="list-style-type: none"> Understand teachers' proficiency in the relevant languages. Understand teachers' knowledge and skills with respect to language and reading instruction. Understand language-related issues with respect to teacher pre- and in-service training. Become knowledgeable about teachers' current instructional practices, strengths and weakness to identify professional development needs vis-à-vis language issues. 	<ul style="list-style-type: none"> Assessment of teacher reading and language proficiency and knowledge (can be self-reported, gathered through observations of teachers' instruction, and/or evaluated during an interview or via a written assessment) Observations of teacher instructional practices for teaching language and reading Surveys of teacher attitudes and beliefs related to language and instruction 	<ul style="list-style-type: none"> What languages do teachers read, write, speak and use and what is their level of proficiency? Does teachers' language proficiency at the school level align with the languages which they are expected to use for reading instruction and instruction of content? In other words, what is the extent of "teacher-student language match"? What are teachers' current instructional practices for teaching reading and language? Do they align with evidence-based best practices? What are teachers' strengths and weaknesses with respect to instruction? Is teacher pre-service preparation provided in teachers' L1 languages/familiar languages? Do teacher trainees have an opportunity to strengthen their oral, expressive (in the case of sign language) and written language and literacy skills in the languages in which they teach? Does pre- and in-service training prepare teachers to teach reading, to teach language (as L2/Lx), and to teach in the languages specified in existing language policy or curriculum, or in the languages newly used for reading instruction? Do teachers receive coaching support in a language they use and understand? Is the language the one they use for instruction? How are teachers currently recruited and placed, and to what extent are language skills considered? What support is provided to support their instruction across different language contexts? 	<ul style="list-style-type: none"> Knowledge (evidence) of teachers' language proficiency Understanding of teachers' current instructional practices Understanding of teachers' knowledge, beliefs and attitudes about language-related issues Understanding of teacher professional development needs

Step to take and why	Information sources to gather	Reflection questions	Outcomes
<p>7. Review existing curriculum and materials and learn about development process.</p> <p>Purpose:</p> <ul style="list-style-type: none"> • Inventory and assess quality of existing teaching and learning materials to identify what can be adapted and what needs to be developed. • Understand specific processes and human resources available for developing TLMs. 	<ul style="list-style-type: none"> • Curriculum for relevant grade levels, languages and subjects • Existing teaching and learning materials (e.g., teacher's guides, student books, supplementary readers) • Reports summarizing previous curriculum review, TLM inventory and review, etc. 	<ul style="list-style-type: none"> • In what languages and dialects are teaching and learning resources currently available for teachers and learners? Does this align with LOI policy? For what languages do materials not exist? • What resources exist in the languages and dialects that could be used and/or adapted to teach reading, language or other subjects? What is the quality of these resources in terms of the language used and other factors? • Are TLMs appropriate for teachers' reading and language skills? What resources can be adapted and which need to be newly developed to effectively provide instruction in the relevant languages, either as L1 or additional languages? What individuals or institutions can contribute to resource development? What would be the process for doing so? • What texts are students exposed to at home? Are text materials at home in the LOI or other languages? What gaps exist in terms of materials availability at home? • What is the process for developing resources to be used in the formal government education system and who is involved? • Who is responsible for approving resources and for addressing issues related to copyright and licensing? 	<ul style="list-style-type: none"> • Knowledge of existing teaching and learning materials and their quality • Understanding of process for materials development and approval
<p>8. Learn about stakeholder knowledge, beliefs and attitudes related to language and language learning.</p> <p>Attitudes and beliefs about language, about those who speak and use specific languages, and about the value of specific languages can profoundly affect efforts to improve early grade reading and instruction.</p> <p>As such, it's important to be aware of both positive and potentially negative attitudes and beliefs</p>	<ul style="list-style-type: none"> • Reports/survey results about language-related knowledge, beliefs and attitudes (reports and surveys related to ethnic-identity may contain useful information on these topics) • Program reports (may include teacher belief/attitude surveys related to reading and language) • Interviews with government officials (at all levels), teachers, parents and caregivers, and those previously involved in 	<ul style="list-style-type: none"> • What languages do stakeholders believe children should learn at school? What is their rationale for using these languages? Do their beliefs align with practice? • What are different stakeholders' attitudes and beliefs about teaching children to read in their L1 or other familiar languages? About teaching children curricular content in their L1 or other familiar language? Are certain stakeholder groups opposed to providing education in the L1/familiar languages, and if so, why? • What attitudes about different languages must be considered when making decisions about their use for education? For example, are certain languages considered more "prestigious" than others, and if so, what are the implications of this? 	

Step to take and why	Information sources to gather	Reflection questions	Outcomes
<p>espoused by stakeholders—from education authorities to teachers to parents—about languages, the ethnic groups that use them, and teaching children to read in certain languages.</p> <p>Program often assume they already know stakeholders' attitudes and beliefs. However, it's important to gather current information from a broad range of stakeholders. This may involve conducting formal and informal interviews of a sample of stakeholders (parents, teachers, education officials, etc.) and/or reviewing existing data and reports with this information. This will help to identify knowledge, attitudes and beliefs that may hinder and support evidence-based approaches to reading and language instruction.</p>	<p>implementing education programs</p>	<ul style="list-style-type: none"> • What knowledge and skills do education officials, school directors, teachers, parents, and community members have regarding L1-based teaching and learning? Regarding L2-based language learning and instruction? • What is the level of stakeholder buy-in and support for providing instruction in languages that are not currently used in schools? 	

Annex E. Language mapping experiences

Afghanistan

The purpose of a language mapping by the Afghan Children Read initiative (supported by USAID) was to document the linguistic and literacy landscape in and around primary schools to better understand current practices under Afghanistan's current LOI policy, which states that either Dari or Pashto should be used for instruction. The language mapping research was designed to inform policy discussions about LOI in the classroom and how to best support children's reading and language acquisition in their mother tongue and the national languages.

To collect data, the research team conducted classroom observations, structured interviews with school principals, teachers and students; and focus groups with parents and community members. Information gathered included the language used in classrooms; teacher self-reported language skills; and stakeholder opinions on language-related issues. Main findings included the following:

- Greater language diversity exists than originally assumed (12-15% of students in some areas do not speak the official LOI).
- Dialects spoken by students differ at times with those spoken by their teachers and found in textbooks.
- Teachers use languages besides the official LOI when students speak other languages, they employ various instructional strategies to support learners whose L1 was not the LOI.

The data collected provide a foundation for broad recommendations regarding language, education and reading instruction in Afghanistan.

To learn more about the instruments, technology and processes used, consult:

Ayari, Susan, and van Ginkel, Agatha J. (2018). Language Mapping Research in Afghanistan: Purpose, Data Collection Issues, Tools and Lessons Learned. Presented at the annual conference of the Comparative and International Education Society (CIES). <https://www.globalreadingnetwork.net/resources/afghanistan-language-mapping-research-purpose-data-collection-issues-tools-and-lessons>.



Photo: Afghan Children Read (USAID), Creative Associates International, 2018 Q1 report

Ghana

Under the USAID-supported Ghana Partnership for Education: *Learning* early grade reading program, the establishment of a Language Policy Working Group (LPWG) led to the recommendation for the program to conduct a language mapping study to understand the language situation in *Learning*'s targeted schools and districts. The language mapping exercise was designed to answer the following question: To what extent does the designation of the Ghanaian language of instruction (LOI) reflect the language environment of Ghanaian schools, as demonstrated by the languages spoken by pupils, teachers, and used in teaching and learning materials?

To answer this question, a census survey was conducted in partnership with the College of Languages Education–Ajumako and the University of Education–Winneba (UEW) between 2016–2017 in 7,105 schools in 100 target districts. In addition to assessing children's language skills, group interviews were conducted with select pupils, and interviews were conducted with teachers and head teachers in kindergarten through primary 3. An inventory of materials was also conducted.

The main findings were as follows:

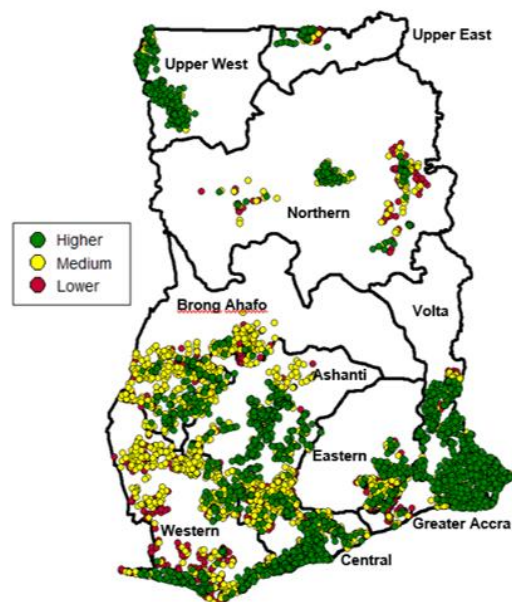
- Just over half of surveyed schools (58%) have high pupil language match.
- In 71% of schools surveyed, the pupil population includes at least two language groups.
- Across the 100 districts surveyed, 73% of schools have high teacher language match.
- Combining pupil and teacher match, 46% of schools have high overall match, 41% medium match and 13% low match.

The findings resulted in a set of short- and long-term recommendations related to LOI assignment in schools, instructional approaches and teacher qualifications and deployment. A "Language Map Decision Tool" has also been developed to assist stakeholders in identifying best and better practices in terms of instruction depending on the degree of teacher-student language match.

For more information, consult:

FHI 360. Ghana *Learning* Language Mapping Study: Analysis Report. FHI 360: Washington, D.C.: FHI 360, 2018.

https://pdf.usaid.gov/pdf_docs/PA00T4QS.pdf.



Map showing degree of teacher-student language "match" in Ghanaian schools (Source: FHI 360, 2018)

Mozambique

Through the USAID-supported *Vamos Ler!* early grade reading program, a language mapping study was conducted in two provinces in northern Mozambique to measure children's oral language proficiency (OLP) in each language they identified knowing. This included Emakhuwa, Elomwend, Echuwabo and Portuguese. The data were used to describe what language skills children bring to the classroom to help them learn to read.

The information gathered assisted program implementers and policymakers to:

- Identify the best choice of language for initial literacy instruction and support children who may not have the OLP required to learn in that language
- Identify multilingual classrooms
- Identify to what extent students' oral language proficiency matches the official language of instruction assigned to the schools

Main findings were as follows:

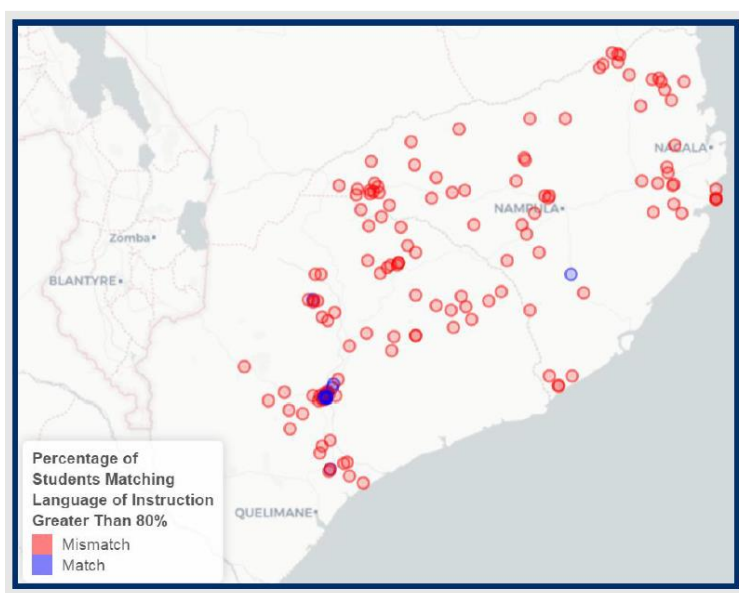
- Large mismatch between students' self-reported linguistic ability and objectively measured linguistic ability
- Nearly three-fourths (73%) of students had an L1 that differed from the official LOI
- 62% of schools are linguistically heterogeneous

The findings are now being used to inform ongoing work to improve the teaching and learning of early grade reading in Mozambique.

A full report and presentation about the study can be found at:

Nakamura, Pooja, Kaitlin Carson, Dustin Davis, Nisha Rai, and Amy Todd. *Language Mapping Study in Mozambique*. Produced by the American Institutes for Research (AIR) for Creative Associates International, on behalf of the U.S. Agency for International Development (USAID). Washington, D.C.: AIR, 2018. Available at https://pdf.usaid.gov/pdf_docs/pa00n7sd.pdf.

Nakamura, Pooja, Nisha Rai, Dustin Davis, Kaitlin Carson, and Corrie Blankenbeckler. "Are You Bilingual? Unpacking 'Language' in Language Mapping in Mozambique." Presentation at the annual conference of the Comparative and International Education Society (CIES). Mexico City, Mexico, 2019. <https://globalreadingnetwork.net/resources/are-you-bilingual-unpacking-language-language-mapping-mozambique>.



Findings from the Mozambique language mapping study show a language mismatch between teachers and students in many schools in certain areas. Source: AIR, 2018

Democratic Republic of the Congo

To support improvements in education access and the quality of reading instruction in the Democratic Republic of the Congo (DRC), the ACCELERE! program, supported by USAID and DFID, conducted a language mapping activity focused on children's and teachers' linguistic skills in DRC's national languages. These languages—Lingala, Ciluba and Swahili—are currently used as the medium of instruction for the first two years of school where ACCELERE! is implemented.

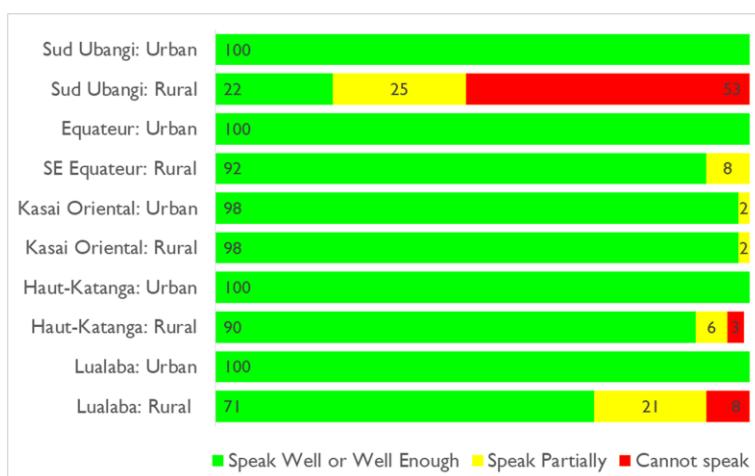
The goal of the language mapping activity—conducted in 185 schools in five provinces—was to verify the appropriateness of the languages being used vis-à-vis students' and teachers' language proficiency, and to understand any sociolinguistic challenges related to effective use of the languages for reading instruction in five provinces. Specifically, the study focused on understanding:

- Language use preference among children in the school community
- Children's level of understanding of the local variety of the national language and the “standard” version of the language used for instruction, including reading
- Teachers' ability in the national language (both “standard” and local versions) and their attitudes towards use of national languages for instruction

While the study found that children in most provinces speak and understand the language assigned for instruction, children in some rural areas do not adequately speak or understand the national language used in schools. Importantly, the study also found that children in both urban and rural contexts in two Swahili provinces use a version of Swahili that differs considerably from the “standard” form used in schools. Eighty (80) percent of teachers, too, reported difficulties “mastering” this version of Swahili. (Overall, though, the majority of teachers were found to speak the national languages they have been assigned to teach.)

The research suggests that additional languages may need to be used in select rural areas where learners do not speak the assigned LOI. In the case of Swahili-speaking areas, instruction and materials may need to be adapted to both leverage similarities between the two versions of Swahili, as well as to attend to the distinct differences, for effective reading instruction to take place.

Figure 1: First grade children's level in the national language – local variety



Language mapping in the DRC provided insight into the languages children understand and use. Source: SIL LEAD and Chemonics International, 2018

For more information about the study and a complete report of results, consult:

SIL LEAD and Chemonics International. *Report on Operations Research for ACCELERE! 1: Sociolinguistic Mapping and Teacher Language Ability*. Washington, D.C.: Chemonics International, 2018.

https://dec.usaid.gov/dec/content/Detail_Presto.aspx?vID=47&ctID=ODVhZjk4NWQtM2YyMi00YjRmLTkxNjktZTcxMjM2NDhmY2Uy&rID=NTIxNjE0.

Annex F. Understanding teachers' knowledge, skills and practices related to language

Teachers' knowledge, skill level and beliefs with respect to language are important issues that should inform the design and development of reading programs, including content and materials, teacher professional development, teacher placement, and advocacy and awareness raising that may need to be conducted. During the program design phase, programs are encouraged to conduct a survey of teachers to understand these issues. Care should be taken to do so in a sensitive and appropriate manner. This includes developing an appropriate language assessment tool (piloting is highly recommended), making sure that all stakeholders are aware of the purpose of the assessment and how results will (and will not) be used, and maintaining teachers' anonymity. Below is a summary of some reading programs' efforts to assess teachers' language skills, knowledge and beliefs.

Ghana

Under the USAID Partnership for Education: Ghana *Testing* activity, a teacher questionnaire was included in the 2015 national EGRA/EGMA survey in Ghana. This was in response to the 2013 EGRA/EGMA pupil data, which raised questions about how both pupils and their teachers experienced the language of instruction (LOI) policy, which stipulates that pupils should be taught in the Ghanaian language of the local area in the early grades and transition to English by grade 4. In an effort to learn more about how the LOI policy is implemented in schools, this teacher questionnaire was added in 2015 to collect more information about teacher preparation and instructional practices related to language use. The questionnaire was administered to 671 grade 2 teachers. Major findings from the teacher survey were: many teachers appear to be posted to schools where they do not speak the language of instruction; many teachers did not study the language for which they must now provide instruction; and some languages have an "oversupply" of teachers, while others face a shortage vis-à-vis the number of schools where a given language is spoken. A complete summary of the results and the instruments can be found here:

<https://shared.rti.org/content/ghana-teacher-questionnaire>.

A follow-up survey conducted as part of the USAID Partnership for Education: Ghana *Learning* early grade literacy program further explored teacher language skills as part of a larger survey aimed at identifying the degree to which the Ghanaian language assigned to be used as the language of instruction matched the languages spoken by pupils, teachers and used in teaching and learning materials. The survey was conducted in more than 7,000 schools in 100 districts where the program is implemented. The result is a typology of school "language match" conditions. Complete survey results and instruments can be found in the full report.

Source: FHI 360. Ghana *Learning* Language Mapping Study: Analysis Report. FHI 360: Washington, D.C.: FHI 360, 2018.

https://pdf.usaid.gov/pdf_docs/PA00T4QS.pdf

Mozambique

To inform various aspects of the USAID-supported Vamos Ler! Program, a qualitative analysis of teachers' instruction was conducted in tandem with an assessment of student language and literacy skills. The survey found that the majority of sampled teachers used both a mother tongue (MT) language and Portuguese to teach in monolingual Portuguese LOI schools. A survey of teachers' beliefs further found that teachers believed that "the impact on student learning in Portuguese was higher when they used both the MT and Portuguese in the classroom." The findings indicate that schools' LOI policies are not necessarily being implemented as intended by teachers who find it necessary to provide some instruction in MT languages.

Sources:

Nakamura, Pooja, Kaitlin Carson, Dustin Davis, Nisha Rai, and Amy Todd. *Language Mapping Study in Mozambique*. Produced by the American Institutes for Research (AIR) for Creative Associates International, on behalf of the U.S. Agency for International Development (USAID). Washington, D.C.: AIR, 2018. Available at https://pdf.usaid.gov/pdf_docs/pa00n7sd.pdf.

Nakamura, Pooja, Nisha Rai, Dustin Davis, Kaitlin Carson, and Corrie Blankenbeckler. "Are You Bilingual? Unpacking 'Language' in Language Mapping in Mozambique." Presentation at the annual conference of the Comparative and International Education Society (CIES). Mexico City, Mexico, 2019. <https://globalreadingnetwork.net/resources/are-you-bilingual-unpacking-language-language-mapping-mozambique>.

Nigeria

To inform materials development and teacher PD, the Nigeria Research and Access Reading Activity (RARA) conducted a simple assessment of grade 2 teachers' phonics, fluency and comprehension skills for the Hausa language. Teachers' knowledge of early grade reading pedagogy and practice, including language-specific issues, as well as their attitudes about teaching in the L1, were also surveyed. The language assessment indicated that teachers had a basic understanding of the relationship between letters and sounds but needed training to teach this skill. The assessment further indicated that teachers' oral reading fluency was suitable for reading aloud to students, and that they would be able to read a teacher's guide provided in Hausa. Instruments and results can be found in the sources listed below.

Sources:

RTI International. *Nigeria Reading and Access Research Activity (RARA): Results of the 2014 Baseline Data Collection in Government Primary Schools in Bauchi and Sokoto States*. Prepared for USAID under the EdData II project, Task Order No. AID-620-BC-14-00002 (RTI Task 26). Research Triangle Park, NC: RTI International, 2014. http://pdf.usaid.gov/pdf_docs/PA00KM2J.pdf.

RTI International. *Nigeria Reading and Access Research Activity (RARA): Results of an Approach to Improve Early Grade Reading in Hausa in Bauchi and Sokoto States*. Prepared for USAID under the EdData II project, Task Order No. AID-620-BC-14-00002 (RTI Task 26). Research Triangle Park, NC: RTI International, 2016. https://pdf.usaid.gov/pdf_docs/PA00KVM1.pdf.



Information in this annex reproduced from: Pallangyo, Amy, and Alison Pflepsen. Handout 12 in “Continuous Professional Development Early Grade Reading Programs (webinar). In *Early Grade Reading Program Design and Implementation: Best Practices and Resources for Successful Training Series*. Prepared for USAID by University Research Co., LLC. (URC) under the Reading within REACH initiative. Contract No AID-OAA-M-14-00001, MOBIS#: GS-10F-0182T. Chevy Chase, MD: URC, July 24, 2019.

<https://www.globalreadingnetwork.net/resources/continuous-professional-development-early-grade-reading-programs>.

Annex G. Materials development process map

This annex is reproduced with permission from FHI 360. It was developed to support reading teams in the production of teaching and learning materials.

Process map—Materials development

This process map is a guiding document for all project teams to appropriately plan for and manage the materials development process. It can be used to draft your annual and quarterly workplans and tools to support staff understanding of the process of materials development and steps where other departments (HR, logistics, operations, finance) and technical teams (ie. training team) need to get involved. This map can be adapted to your project to account for number of staff, language policy, and donor expectations.

Overview: The process is divided into 3 main steps and sub-steps:

A. Preparation for Materials Writing Process

- Start-up and planning
- Develop base documents
- Review and test base documents
- Finalize for validation

A. Materials Writing Process

- Development of all texts (read-alouds, student texts)
- Development and ongoing review of lesson plans

C. Desktop Publishing, Validation, and Printing

- Compilation and Final review of materials
- Validation and finalization of materials

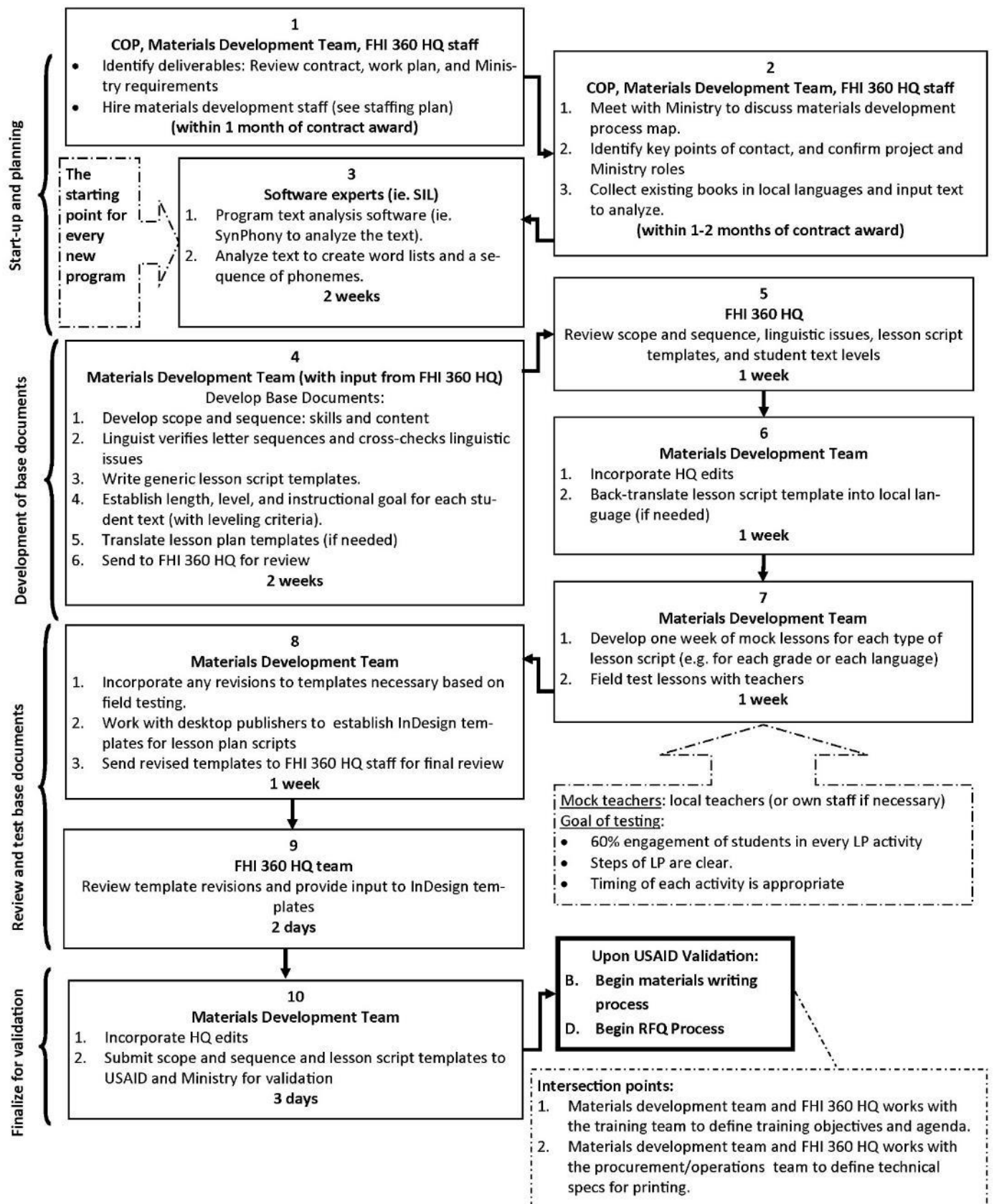
Assumptions: To most effectively adapt this process map, it's essential to understand the assumptions surrounding it:

- *Language readiness and orthography standardization:* This map assumes that the orthography of the languages of instruction chosen for materials development is standardized for education. If this isn't yet done, the language(s) of instruction need to be mapped out. Tools like SIL's orthography assessment tool and assessment of language readiness (see <https://www.sil.org/language-assessment>) can be used to facilitate this process.
- *Time allocated to each step:* The time for each step assumes having sufficient trained staff onboard, good working relationships with the donor and the local government and local schools, and excellent communication between the local team and the HQ team.
- *Contracting issues:* The smooth and timely implementation of this map depends on the timely hiring of staff and coordination with other departments (finance, operations, logistics, HR). Therefore, this map assumes strong collaboration between technical and finance, HR, and operations team to avoid delays in the process of budgeting for activities, hiring of staff, procurement of materials.

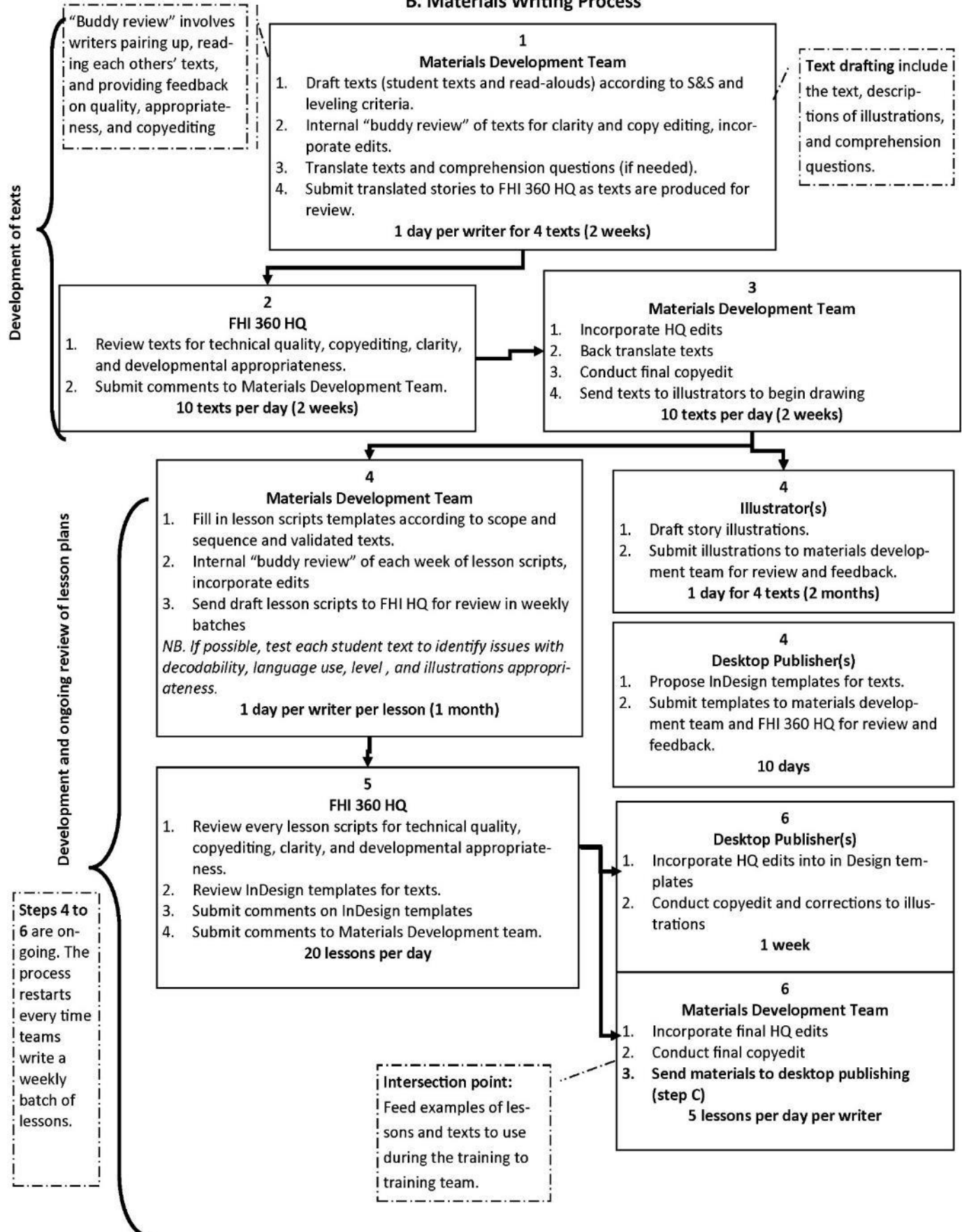
Intersection points: In projects, it's easy to become focused on your own deliverables. This sometimes leads to delays in coordination with other teams and departments who are essential to making sure your materials are of quality, get printed, distributed on time, and that your end-users (ie. teachers) get training on them. This map includes key "intersection points" with other departments and teams along the materials development process. Though, the more continuous coordination across departments, the better.

Materials Development Process Map

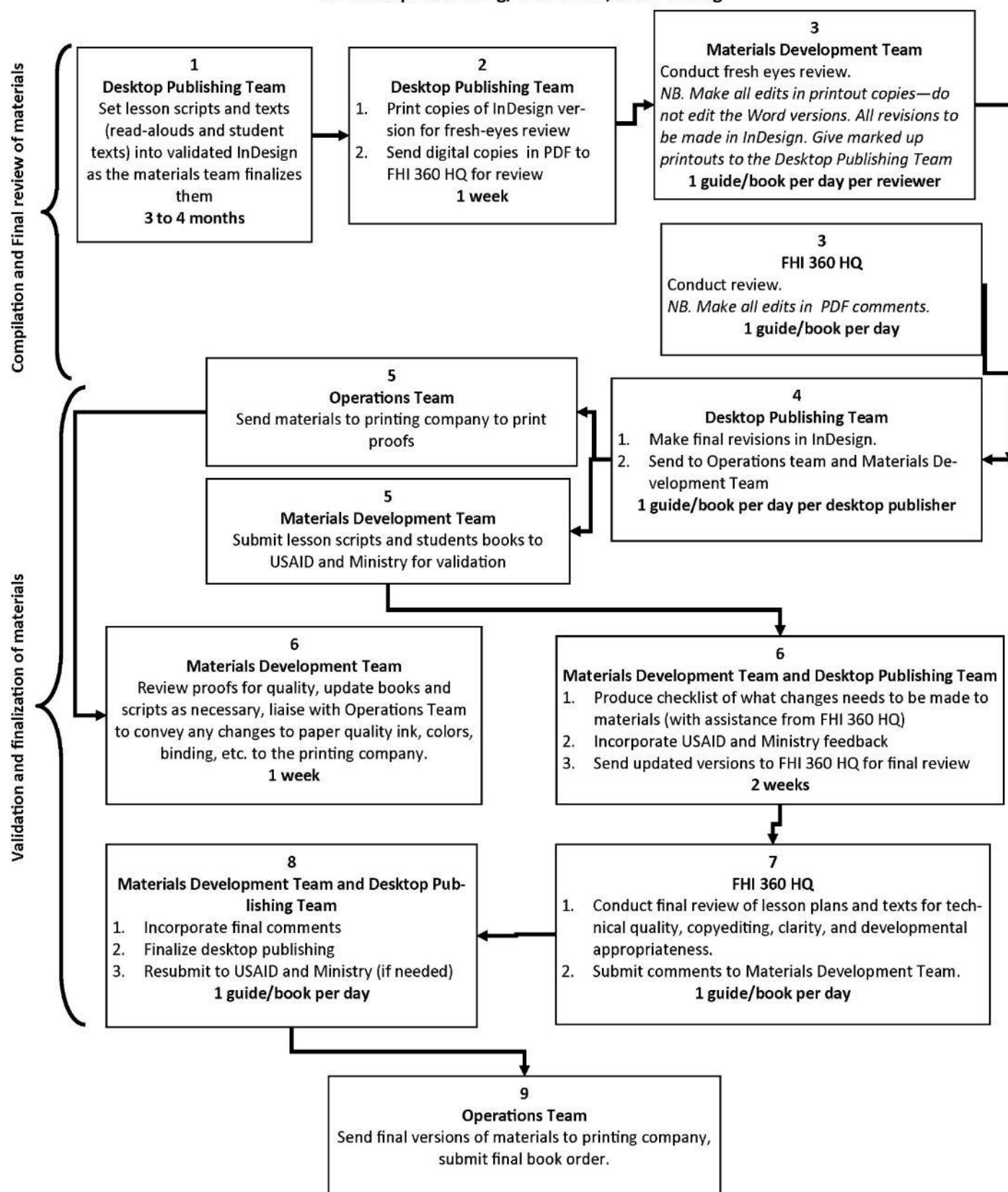
A. Preparation for Materials Writing Process



B. Materials Writing Process



C. Desktop Publishing, Validation, and Printing

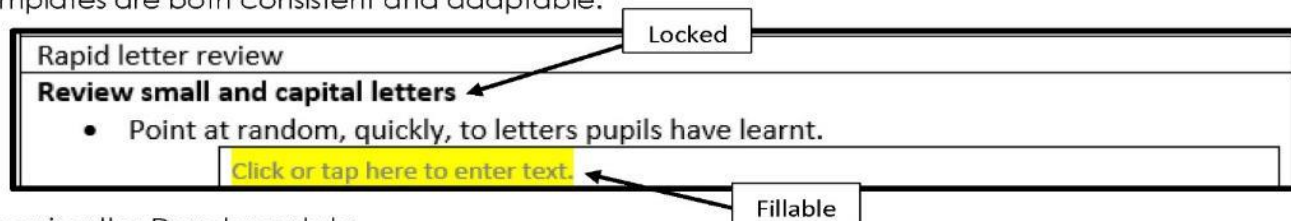


Annex H. Lesson plan template – Example 1

Creating Locked Templates

Mackenzie Matthews, FHI360 | CIES 2018

Creating locked, fillable templates is a strategy for design and quality control in large-scale materials development. In these templates, the content that should not be edited is locked and fillable boxes are inserted for content that is to be inputted by the materials writer. This ensures templates are both consistent and adaptable.



Opening the Developer tab:

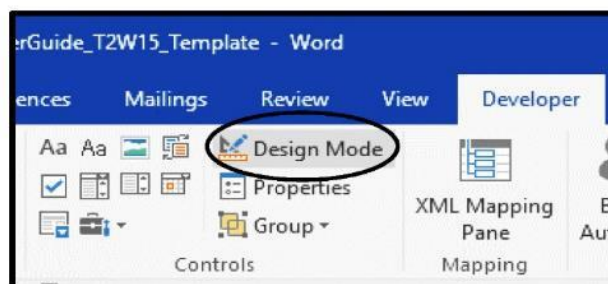
All functions related to creating locked templates are found in the Developer tab of Microsoft Word.

1. Click the **File** tab → **Options** → **Customize Ribbon**
2. Under **Customize the Ribbon**, in the **Main Tabs** list, select **Developer** and click **OK**.

Creating fillable text boxes in your template:

Fillable boxes are spaces for a materials writer to insert original content. All the controls to do this are found in the Developer tab.

1. Under the Developer tab, click **Design Mode**. This will show you the various content controls you are adding. The boxes and content controls shown in Design Mode will not print.



2. Under Developer tab, click **Rich Text Content Control** (allows writers to format text as bold or italic, and type multiple paragraphs) or **Plain Text Content Control** (allows writers to insert plain text without line breaks). This will add a fillable box to your template.

3. Click on the box. Under the Developer tab, click **Properties** to set the properties for the box:
 - Add a label to help writers know what should go into the box.
 - Set the style for content entered into the box. (Optional – Name and save the style for later use.)

4. Optional – Change the standard text in the box ("Click or tap here to enter text") to suggested scripting or other tips.

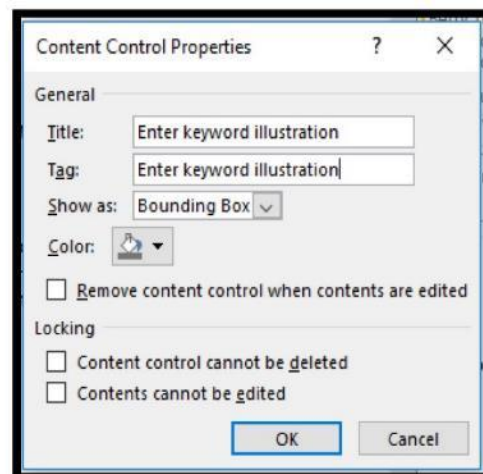
5. Optional – Click the label of your box to select it. Under the Home tab, click the **Text Highlight Tool** to highlight your box in your chosen color.



Creating fillable image boxes in your template:

Image boxes indicate where a writer or illustrator should insert illustrations, icons, or pictures.

1. Under Developer tab, click **Picture Content Control** 
2. Click on the box. Under the Developer tab, click **Properties** to set the properties for the box:
 - Add a label to help writers know what should go into the box.



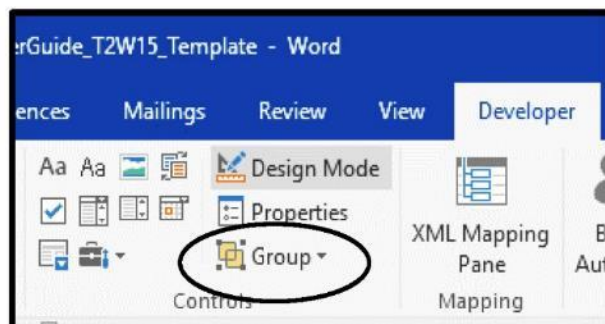
Locking and unlocking your template:

Locking your template will ensure that users will be able to edit only the fillable text and image boxes you've set up. Anything not inputted using the Developer tab will be locked.

1. Select all (CTRL+a) of your document.
2. Under Developer tab, click **Group**. From the drop-down menu, choose **Group**.
 - Your template is now locked and ready for distribution!

Unlocking your template will allow you to make further edits to the content and fillable boxes.

1. Select all (CTRL+a) of your document.
2. Under Developer tab, click **Group**. From the drop-down menu, choose **Ungroup**.



ASANTE TWI – LESSON 81

(A)

New Letter: [Click or tap here to enter text.](#)

Activity	Time (min)
<p>The pupils will be able to:</p> <ol style="list-style-type: none"> 1. Identify and say the target sound, and recognize the letter that represents that sound 2. Blend letter sounds to read syllables and syllables to read words 3. Read syllables quickly and accurately 	
Rapid letter review	1
<p>Review small and capital letters</p> <ul style="list-style-type: none"> • Point at random, quickly, to letters pupils have learnt. <p>Click or tap here to enter text.</p>	
Teach the sound	4
<p>Tongue twister—Say the sound</p> <ul style="list-style-type: none"> • Say the tongue twister. Pupils repeat. <p>Click or tap here to enter text.</p> <ul style="list-style-type: none"> • Ask pupils what sound they hear most. (Answer: / Click or tap here to enter text. /) 	
<p>Listening game – First sound</p> <ul style="list-style-type: none"> • Say each word below. Pupils put a hand up if they hear the sound at the beginning of the word and on the desk if they do not. <p>Click or tap here to enter text.</p>	
Letter and keyword	10
<p>Teach the letter</p> <ul style="list-style-type: none"> • Point to the small letter Click or tap here to enter text. on the alphabet strip or on the board. • Say: This is our new letter of the day. This letter makes the sound /[ENTER LETTER OF THE DAY]/. Say it with me: /[ENTER LETTER OF THE DAY]/. Ask pupils to say the sound with you (no more than 2 times). Point to the capital letter Click or tap here to enter text. on the alphabet strip or on the board. • Say: This is the same letter. It also makes the sound /[ENTER LETTER OF THE DAY]/. We see it look like this when it is at the beginning of a sentence. • Point to the small letter Click or tap here to enter text. on the alphabet strip or on the board again. • Say: Most of the time in words, we will see it look like this. 	
<p>Keyword picture study</p> <ul style="list-style-type: none"> • Say: What do you see? • Call on 1-2 pupils to name what they see in the picture. • Say the keyword. Touch the letter of the day in the keyword in the pupil book. Say the sound. • Say: Say the word with me: "[ENTER KEYWORD]". Can you hear the /[ENTER LETTER OF THE DAY] in "[ENTER KEYWORD]"? 	

Source: Matthews, Mackenzie. "Unified Design for 11 Languages—Bridging Systems and Innovations." Presentation at the annual conference of the Comparative and International Education Society (CIES), Mexico City, Mexico, March 2018.

<https://globalreadingnetwork.net/resources/developing-early-grade-reading-materials-11-languages-learning-ghana>

Annex I. Lesson plan template – Example 2

To support the development of quality teaching and learning materials, the Nigeria Reading and Access Research Activity (RARA) developed resources to support the materials development team. (RARA was a USAID-supported research initiative implemented by RTI International from 2014-2015.) The table below describes the content for each lesson, to be included in the teacher's guide. The lesson plan template then provides writers with specific parameters for the contents of the pupil lesson book. Materials developed using this lesson plan template can be found here:

- Nigeria RARA Primary 2 Pupil Reading Book: http://pdf.usaid.gov/pdf_docs/PA00KX7N.pdf
- Nigeria RARA Teacher's Guide: http://pdf.usaid.gov/pdf_docs/PA00KM44.pdf

Content	Parameters
Syllable counting	3 words
Letters	2 taught explicitly
Syllables	2 taught explicitly
Decodable words	3 words, Term 1: 1–2 syllables; Term 2: 1–3 syllables; Term 3: 1–3 syllables
Decodable sentence	Term 1: sentence with 3–4 words; Term 2: 3–5 words; Term 3: 4–6 words
Illustration	Related to the passage, not overly complex. Will develop character, setting and actions. Possibly used for syllable counting.
Passage reading	Term 1: 8–12 words, 3–4 sentences with a repetitive structure; Term 2: 10–20 words, 4–5 sentences, less repetition; Term 3: 20–30 words, 5–6 sentences, even less repetition
Sight words	2–3 per week
Story Read Aloud	75–150 words per reading; include before, during, and after activities; 2 vocabulary words explicitly taught.

Nigeria RARA Pupil Book Lesson Guidelines (Page 1: Hard copy for each writer to refer to throughout the workshop. Page 2: Provide one per each week of content. Writers can hand write content into the paper copy.)

Theme <i>Guidelines:</i> Identify the theme for the week.	Description of the illustration for the story <i>Guidelines:</i> Describe the illustration for the illustrator. It should be related to the passage, as it will support word identification. It should not be overly complex. It might include images that are used in the Beat the Word activity. <i>Note:</i> We should identify core characters that appear throughout the 48 lessons (e.g., a named girl, a named boy) and possibly the same setting.
Beat the Word <i>Guidelines:</i> List 4 words that have 2-4 syllables. Ideally, the words could be communicated through an illustration, and use sounds that are being taught that week. These words will not appear in the pupil book. They will only appear in the teacher guide.	

Letters Guidelines: <ul style="list-style-type: none"> • Enter two per week • Upper and lower case • Even if they are not both new, we will teach two explicitly 	Movement for letter sound 1 Guidelines: The action should be something that either: <ul style="list-style-type: none"> • Represents the sound of the letter (Example: A running engine can sometimes sound like the letter m) <p style="text-align: center;">OR</p> <ul style="list-style-type: none"> • The first letter of the action makes the sound (Example: March for letter m) 	Movement for letter sound 2 Guidelines: <ul style="list-style-type: none"> • Same guidelines as for the letter sound 1 • Even if the letter sound movement was already introduced, please write the description here 	Passage reading Guidelines: <ul style="list-style-type: none"> • Write a passage related to the theme. • T1 passages should contain 8-10 words, 3-4 sentences (3 dominant); repetition of structure (Example: Mom is here. Dad is here. Dan is here. The family is together.) • T2 passages should contain 10-30 words, 4-5 sentences (4 dominant) and less repetition than T1 passages. • T3 passages should contain 20-30 words, 5-6 sentences (5 dominant) and even less repetition. • The passage should have decodable words. It can include the decodable sentence that was written for the lesson. • The passage can have 2 to 3 new sight words (a word that not all of the letters have been in isolation). • Include an English translation. • Underline the sight words. Read aloud Guidelines: This is a placeholder to list the story or page numbers from a longer story that will be used in this week's lesson. These stories will <u>not</u> appear in the pupil book. They will only appear in the Story Read Aloud. Your turn Guidelines: This will be the same for each week. Nothing needs to be written. <i>Option 1:</i> Practice writing your letters. <i>Option 2:</i> Read today's lesson to a friend or family member.	
Syllables – Guidelines: Guidelines: List two syllables. Both of them should include the new letters. There might be times when one of the syllables uses a vowel that has been taught in previous weeks.				
Decodable words – Guidelines: <ul style="list-style-type: none"> • List 3 words. Term 1 words should be 1-2 syllables; T2 1-3 syllables; T3 1-3 syllables. • The words should use the syllables that were taught in that week's lesson or in a previous week. (Each part of the word should have been taught explicitly at some point.) • Include an English translation. 				
Decodable sentence – Guidelines: <ul style="list-style-type: none"> • Identify one sentence. It should have decodable words. • Term 1 sentences should be 2-4 words; T2 3-5 words; T3 4-6 words. The sentences should use decodable words that were taught in that week's lesson or in a previous week. • A sentence can have one sight word. This is a word that the parts have not been taught in isolation. Underline the sight word. • Include an English translation. 				
Term number <i>Write the term.</i>	Week number <i>Write the week number.</i>	Writers (date and initials) <i>List the authors of this week's materials and the date written.</i>	First proof (date and initials) <i>Another writer or a facilitator should review the content to verify it conforms to the guidelines. The date and the reviewer's initials should be entered.</i>	Entered to soft copy (date and initials) <i>After the proof has been reviewed, the content from this hard copy should be entered into a soft copy. The date and the typist's initials should be entered.</i>

Annex J. Peer review checklist to support materials development

This annex is an expert from a tool developed by FHI 360 to support materials development in 11 languages for USAID's Ghana *Learning* initiative. More information about the materials development process in Ghana can be found in the list of references.

The purpose of the P1 Peer Review Checklist is to ensure that the *Learning* materials are complete and of the highest quality. There is one checklist for each lesson in a week. Only the activities that require writer input are included on the checklists.

Reviewer's Name: _____ Date of Review: _____

Writer's Name: _____ Lessons _____ - _____

First lesson of the week (A) Lesson # _____

Lesson Plan: New Letter	Comments
Rapid Letter Review <ul style="list-style-type: none"> <input type="checkbox"/> There are 8 review letters <input type="checkbox"/> Review letters include the most recent letter learned <input type="checkbox"/> Review letters include at least 4 letters from T1 	
Teach the Sound <ul style="list-style-type: none"> <input type="checkbox"/> <i>Tongue Twister</i> emphasizes the letter sound of the week <input type="checkbox"/> Words chosen for <i>Listening Game</i> follow design guidance <input type="checkbox"/> Words chosen for <i>Listening Game</i> include the necessary instances of the letter sound of week 	
Letter and Keyword <ul style="list-style-type: none"> <input type="checkbox"/> Steps have the correct letter of the week inserted. <input type="checkbox"/> Scripting has the correct keyword for the letter of the week inserted. 	
Read Syllables <ul style="list-style-type: none"> <input type="checkbox"/> Letters inserted for practice syllable correspond with the first syllable in Box #2 in Pupil Book 	
Overall Specifications	Comments
Alignment with S&S/Word Lists <ul style="list-style-type: none"> <input type="checkbox"/> Focuses on correct letter of the day <input type="checkbox"/> Activity words chosen are decodable (from word lists) 	
Content <ul style="list-style-type: none"> <input type="checkbox"/> All scripting is correctly placed <input type="checkbox"/> Style guidance is followed 	

Pupil Book: New Letter	Comments
<p>Letter and Keyword</p> <ul style="list-style-type: none"> <input type="checkbox"/> Letter of the week is correct <input type="checkbox"/> Letter of the week is in the following format: <input type="checkbox"/> [small](one space)[capital] <input type="checkbox"/> Keyword is correct <input type="checkbox"/> Keyword analysis breaks word into syllables, then into letter of the week 	
<p>Syllable Boxes</p> <ul style="list-style-type: none"> <input type="checkbox"/> Box #2 includes syllables built with the letter of the week <input type="checkbox"/> Box #3 includes syllables built with the letter of the week, as well as 3 previously learned letters (1-2 from T1) 	
<p>Word Bubbles</p> <ul style="list-style-type: none"> <input type="checkbox"/> Words chosen are decodable (from word list) <input type="checkbox"/> Words chosen include letter of the week <input type="checkbox"/> Words chosen have at least 2 syllables 	
<p>Suggestions for Improvement:</p>	

continues for other content areas

