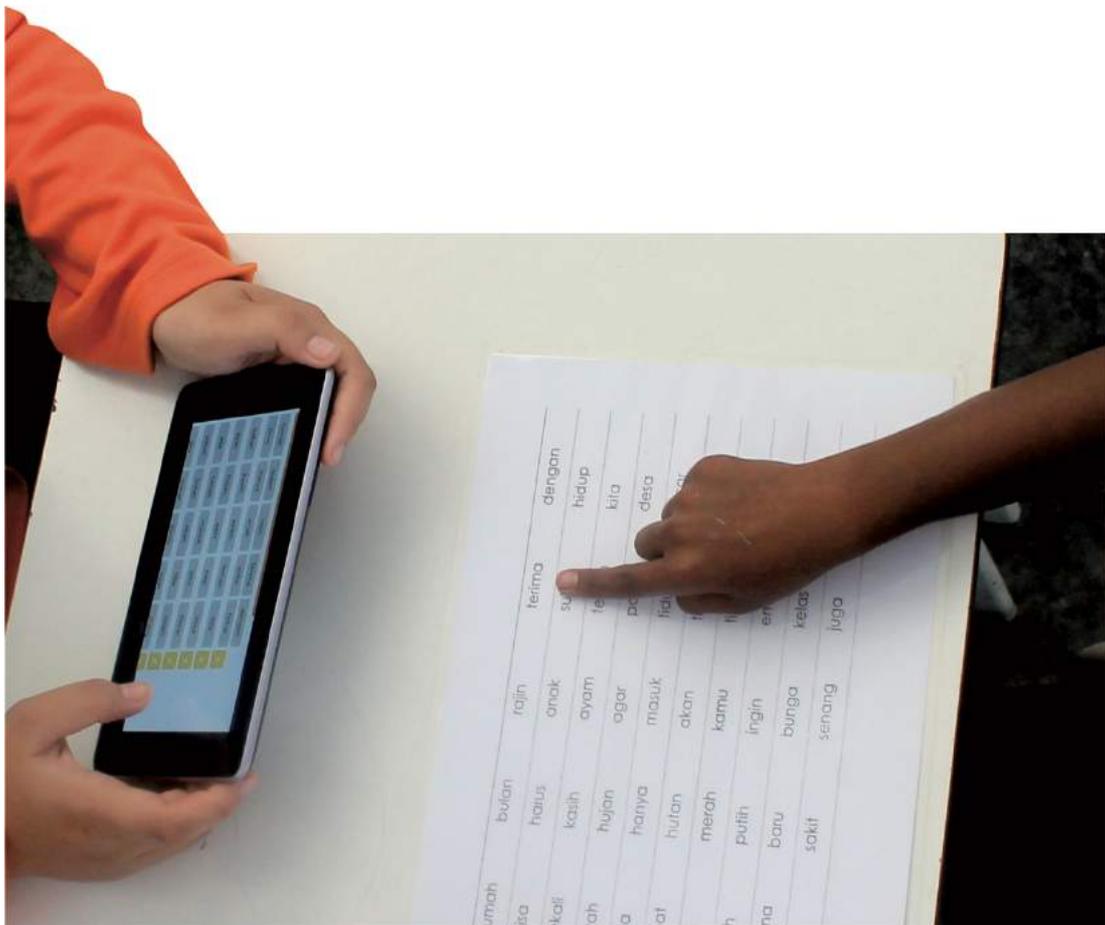




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USAID Prioritizing Reform, Innovation, and Opportunities for Reaching Indonesia’s Teachers, Administrators, and Students (USAID PRIORITAS)



MIDLINE MONITORING REPORT, VOLUME 3: An Assessment of Early Grade Reading— How Well Children Are Reading in Cohort 2 Districts

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USAID/Indonesia

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Abbreviations

CIWPM	Correct invented words per minute
CLPM	Correct letters per minute
CWPM	Correct words per minute
DBE	Decentralized Basic Education
DIBELS	Dynamic Indicators for Basic Early Literacy Skills
DID	Difference in differences
EFA-FTI	Education for All–Fast-Track Initiative
EGRA	Early Grade Reading Assessment
GOI	Government of Indonesia
IRR	Inter-rater reliability test
LPM	Letters per minute
M&E	Monitoring and evaluation
MOEC	Ministry of Education and Culture
MORA	Ministry of Religious Affairs
ORF	Oral reading fluency
PRIORITAS	Prioritizing Reform, Innovation and Opportunities for Reaching Indonesia’s Teachers, Administrators, and Students
Ref	Reference point
RTI	RTI International (a trade name of Research Triangle Institute)
SD	<i>Sekolah Dasar</i> (secular primary school)
SE	Standard error
SMP	<i>Sekolah Menengah Pertama</i> (secular junior secondary school)
TK	<i>Taman Kanak-Kanak</i> (secular pre-school)
TTI	Teacher Training Institute
US	United States
USA	United States of America
USAID	United States Agency for International Development
WPM	Words per minute
YLAI	<i>Yayasan Literasi Anak Indonesia</i> (Indonesian Children’s Literacy Foundation)

Executive Summary

In late 2015, the United States Agency for International Development-funded Prioritizing Reform, Innovation, and Opportunities for Reaching Indonesia's Teachers, Administrators, and Students (USAID PRIORITAS) project conducted a midline study of early grade reading levels in previously selected Cohort 2 districts to assess:



Students reading books before taking the EGRA.

- Improvements, over time, in children's reading performance in the early grades, within and across sampled schools.¹
- Improvements, over time, in children's reading performance in the early grades, resulting from the USAID PRIORITAS intervention.
- How, over time and within and across sampled schools, teachers are teaching children in the early grades to read.

The purpose of this study is to assess the project interventions for early grade reading in Cohort 2 schools two years after implementation began. Implementation took place in seven provinces: Aceh, North Sumatra, Banten, West Java, Central Java, East Java, and South Sulawesi.

The assessment results are presented in two parts: Part one examines improvements, if any, in how well children are reading according to baseline and midline Early Grade Reading Assessment (EGRA) results within and across sampled groups to determine the impact of USAID PRIORITAS' invention. Part two discusses the findings about how well teachers are teaching reading over time and within and across sampled schools.

How well children in the early grades are reading

In follow-up to the Baseline Cohort 2 results from November 2013,² USAID PRIORITAS assessed the reading ability of grade 3 children in Cohort 2 schools in a midline survey two years after the Baseline study, using the USAID PRIORITAS-developed EGRA. The EGRA results reported in this document reflect the 2015 school year midline measurements of student performance in key pre-reading and reading skills among grade 3 students in Cohort 2 partner and comparison schools. In addition, Cohort 2 baseline data from 2013 is used to show improvement over the two years of program implementation.

¹ Sampled schools throughout this report refer both to partner schools and to comparison schools that were

² Baseline Cohort 2 results were collected in 2013 and reported in the Baseline Monitoring Report, Volume 3, in March 2014.

The Cohort 2 baseline sample consists of 3,574 grade 3 children: 1,768 from 80 comparison schools and 1,806 from 80 partner schools in seven provinces, with the baseline assessment administered in November 2013. The Cohort 2 midline sample consists of 3,555 grade 3 children: 1,739 from 80 comparison schools and 1,816 from 80 partner schools in seven provinces, with the midline assessment administered in November 2015.



Conducting the EGRA at SDN Jogotrunan, Lumajang, East Java.

The EGRA consists of six subtasks that measure children’s early reading skills. Observed results revealed promising gains in key pre-reading and comprehension skills—letter name knowledge, familiar word reading, invented word decoding, oral reading fluency, reading comprehension, and listening comprehension. For the grade 3 EGRA, Table I below shows that, on average, students in partner and comparison schools had reached an optimal or near optimal level of

competency in letter name knowledge (subtask 1) and in familiar word reading (subtask 2), even at baseline monitoring. Based on a target oral reading fluency of 60 words per minute (WPM)³ for early grade 3 students, regression calculations based on Cohort 2 data suggest students should be able to identify at least 71.2 letters per minute (LPM)⁴, read at least 55.8 familiar unconnected WPM, and decode at least 28.9 invented WPM to read connected text at a speed of at least 60 WPM (ORF). From these targets, it is clear that, on average, students in Cohort 2 sampled schools exceed expectations for letter name knowledge, familiar word reading, invented word decoding, and oral reading fluency at baseline and midline in both sampled groups. Differences in gains on the two subtasks between the baseline and midline monitoring are less than **two** words per minute, which means that students both in partner and in comparison schools are already good at letter name knowledge and familiar word reading skills. In the more difficult task of invented word decoding, students in sampled schools saw significant increases of at least 5.5 WPM in this skill within sampled group. For reading text passages, students in the sampled partner and comparison schools maintained reading speeds from baseline at midline with slight increases in the proportion of students able to read at least 60 WPM (65.3% in comparison schools, an increase of +2.1% from baseline; 73.1% in partner schools, an increase in +3.2% from baseline). The focus now should be on looking at the gains made in reading comprehension skills attained over the two-year period.

Students’ ability to understand what they read averaged 3.9 out of 5 questions (78%) for partner schools and 3.7 out of 5 questions (74%) for comparison schools at midline; this is a score increase of 0.5 (roughly 15%) for each sampled group. At midline, children in sampled partner and comparison schools achieved an average listening comprehension score of 2.6

³ The terms “correct words per minute” (CWPM) and “words per minute” (WPM) are used interchangeably throughout this document and have the same meaning.

⁴ The terms “correct letters per minute” (CLPM) and “letters per minute” (LPM) are used interchangeably throughout this document and have the same meaning.

correct answers out of 3 questions asked (85%)—an increase of roughly 1 correct answer from baseline, regardless of sampled group. At baseline, about half (55.6% in partner schools; 52.1% in comparison schools) of the assessed children were able to read at an 80% or better comprehension level. At midline, around 70% (72.8% in partner schools; 65.7% in comparison schools) of the assessed children were able to read at an 80% or better comprehension level.

Overall, while students in each sampled group showed average improvements above the baseline scores at about the same rate, students in sampled partner schools continue to score better on all six subtasks compared to students in sampled comparison schools. In familiar word reading, oral reading fluency (ORF), and reading comprehension, students in sampled partner schools scored significantly higher than their counterparts in sampled comparison schools.

The improvement of students' scores, both in partner as well as in comparison schools at almost the same rate, could be explained by various factors. First, many districts have been touting the USAID PRIORITAS training as an example for all schools to follow. In addition to dissemination training from USAID PRIORITAS, comparison schools also received other similar training from the Government of Indonesia (GOI) or from other donors or foundations. The data collected by the project monitoring team shows that 51.6% of the principals and teachers of comparison schools had received some kind of training. Secondly, some of the project facilitators are from comparison schools, and no doubt, they would have implemented good practice in their own schools that they had acquired from their training. Thirdly, it could be that significant improvements need more time to become apparent, as the third round of school training, which specifically focuses on early grade literacy, is yet to be implemented in early 2016. The cascade training model, involving three levels of training from the national to the school level, needs time to be implemented, and the results also need time to become evident in schools. Another explanation could be that the assessment instrument was designed below the students' pre-reading skills achievement level and, therefore, was not able to distinguish students' ability at higher level reading skills.

Table 1: Grade 3 EGRA Results Summary

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Letter Name Knowledge (CLPM)	Comparison	83.78 (0.43)	85.83 (0.51)	-0.57	0.54	-0.02
	Partner	85.71 (0.47)	87.2 (0.45)			
Familiar Word Reading (CWPM)	Comparison	65.05 (0.49)	66.85 (0.57)	-0.49	0.65	-0.02
	Partner	69.49 (0.57)**	70.79 (0.53)**			
Invented Word Decoding (CIWPM)	Comparison	33.12 (0.31)	38.78 (0.42)**	-0.19	0.79	-0.01
	Partner	34.89 (0.35)+	40.35 (0.36)**			
Oral Reading Fluency (ORF)	Comparison	69.43 (0.52)	69.69 (0.58)	-1.54	0.18	-0.05
	Partner	74.77 (0.62)**	73.49 (0.58)**			
Reading Comprehension (5)	Comparison	3.21 (0.03)	3.71 (0.03)**	0.03	0.63	0.02
	Partner	3.41 (0.03)**	3.93 (0.03)** **			
Listening Comprehension (3)	Comparison	1.5 (0.02)	2.55 (0.01)**	-0.1	< 0.01	-0.12
	Partner	1.6 (0.02)+	2.56 (0.01)**			

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
80% or Better on Reading Comprehension	Comparison	52.05% (0.94)	65.73% (0.93)**	0.04	0.07	0.07
	Partner	55.59% (1.09)	72.78% (0.93)** ++			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

The results of the sampled schools show some subgroups of children outperforming others in comparison with their grade 3 peers, as noted below:

- In North Sumatra Province, a DID effect in favor of the USAID PRIORITAS intervention was observed for all subtasks; for the letter name knowledge, invented word decoding, and reading comprehension skills, the effect was significant at the 0.001 level.⁵ On letter name knowledge, familiar word reading, invented word decoding, oral reading fluency, and reading comprehension, partner school students significantly outperformed comparison school students in North Sumatra, and on average, partner school students read +23.9 WPM faster on the oral reading fluency (ORF) subtask than students in comparison schools.
- Students in samples from Banten, West Java, Central Java, and East Java provinces continue to perform better on the reading skills assessments than those from the other three provinces (Aceh, North Sumatra, and South Sulawesi), according to regression models when other demographic features are controlled. Regression models indicate that students from these provinces read, on average, at least +20.6 WPM faster on ORF than students in Aceh or North Sumatra provinces and at least +8.2 WPM faster than students in South Sulawesi Province.
- At baseline, girls in the sample schools significantly outperformed the boys on all subtasks. Midline results show that girls continue to score higher than boys in all subtasks when stratified by partner and comparison schools. Regression models suggest girls score, on average, +7.9 words per minute higher on ORF than boys, when accounting for other predictors of reading ability.
- At baseline, children in rural schools read at lower levels than their peers in urban schools. Midline results continue to show rural students scoring lower on all subtasks, compared with urban students within partner and comparison schools. Regression models suggest that attending an urban school increases ORF by an average of +10.5 words per minute, when accounting for other predictors of reading ability.
- At baseline, children without pre-school experience read at lower levels than their peers with pre-school experience. Midline results continue to show students without pre-

⁵ This represents the probability of observing these DID values due to random chance. Specifically, an alpha value of 0.001 means that the probability of observing the DID value for a given subtask is less than or equal to 0.10%, based on the assumption that there was no difference in the rate of growth over time between students in partner and in comparison schools. Given that the probability of observing these values is low ($\leq 0.10\%$), it is possible to trust that students in partner schools indeed improved performance on the given subtask faster than those in comparison schools.

school experience as scoring lower on all subtasks compared to those with pre-school experience within partner and comparison schools. Regression models indicate that attending pre-school increases ORF by an average of +15.4 words per minute, when accounting for other predictors of reading ability.

- At baseline, children that did not speak the language of instruction at home read at lower levels than their peers that speak the language of instruction at home. Midline results continue to show that within partner and comparison schools, students who speak languages other than Bahasa Indonesia⁶ at home score lower on all subtasks compared with students that do speak Bahasa Indonesia at home. Regression models indicate that speaking Bahasa Indonesia at home increases ORF by an average of +8.9 words per minute, when accounting for other predictors of reading ability.
- At baseline, students in partner schools scored higher than students in comparison schools on all subtasks, but they significantly outperformed students in familiar word reading, invented word decoding, oral reading fluency, reading comprehension, and listening comprehension. This trend continued at midline for all subtasks with a few exceptions. While still scoring above comparison school students at midline, partner school students no longer significantly outperformed comparison school students in invented word decoding and listening comprehension. Regression models suggest that attending a partner school increases ORF by an average of +2.8 words per minute, when accounting for other predictors of reading ability.

One study result, which is less consistent with results from other studies and education research, shows that students in the sample partner and comparison schools scored better when they indicated no parental support with their studies. However, this trend was also observed in the Cohort 1 baseline and midline and Cohort 2 baseline studies. One interpretation may be that in most households, only young children or children who are struggling with reading receive support from their parents. Children who are already able to read are left to read by themselves.

Regression models suggest that students in secular schools perform significantly better on familiar word reading, invented word decoding, and oral reading fluency. On average, a student that attends a secular school should expect to read +5.2 WPM faster compared with a student attending a religious school. These models also indicate that students in private schools score higher than students in public schools for invented word decoding and oral reading fluency. On average, a student that attends a private school should expect to read +3.0 WPM faster compared with a student attending a public school. Although more private schools in the sample are private madrasah, some of which tend to be under-resourced and may have some teachers with lower qualifications, when considering these two traits together, students attending secular private and secular state schools score, on average, higher than students attending religious private or religious state schools.

⁶ The terms “Indonesian language” and “Bahasa Indonesia” are used interchangeably throughout this document and mean the same thing.

How well teachers are teaching reading in the early grades

The project also conducted classroom observations and interviews with grade 1 and grade 2 teachers in the same 160 schools where EGRA data was collected, to see how these teachers taught reading. A total of 320 teachers were observed and interviewed. Additionally, focus group discussions with principals and parents were held to find out how schools and parents supported reading. Table 2 presents the observation, interview, and focus group results.

Table 2: Summary of the Baseline (2012), the Second Round (2013), and the Third Round (Midline 2014) of Monitoring Indicators

Indicator	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
Early grade teachers demonstrate good practice in teaching and assessing reading	15.0%	70.3%	77.6%	15.7%	n/a	35.0%
Early grade reading materials are regularly used	30.0%	64.2%	59.0%	28.9%	n/a	43.1%
Primary school managers initiate activities to create a school reading culture	46.3%	76.3%	91.3%	48.8%	n/a	53.8%

Classroom observation results showed a continuing increase of early grade teachers who demonstrate good practice in teaching and assessing reading in all sampled groups (from 15% at baseline to 77.6% at midline in partner schools and 15.7% to 35% in comparison schools)

The regular use of early grade reading materials in partner schools also increased from 30% at baseline to 59% at midline. Similarly, smaller increases were also found in comparison schools, from 28.9% at baseline to 43.1% at midline.

In partner schools, 46.3% of school managers initiated activities to create a reading culture during the baseline, which increased to 91.3% by the midline monitoring. The percentage increase in comparison schools was much lower than the increase in partner schools.

The EGRA data shows that the partner and comparison schools have both progressed almost at the same rate. However, the classroom and school data shows that greater qualitative improvements have been made in the partner schools when compared to comparison schools. These improvements are evident in the increases from the baseline to the midline monitoring in the early grade teaching practice, as well as in the increases in using reading materials and implementing school reading programs. Quantitative gains likely need a longer time than qualitative gains to become apparent. The project expects that more significant gains will be made by the endline monitoring, especially after training on the early grade module has been completed.

How the project is addressing the EGRA findings

The results of the project's Cohort 1 and Cohort 2 baseline EGRA have been used to inform the strengthening of project activities in reading and to advocate for the host government institutions, teacher training institutes, schools, communities, and parents to increase children's reading culture through the following components:

Component 1: Improve the quality and relevance of teaching and learning in schools through pre- and in-service training. The project works with partner Teacher Training Institutes (TTIs) to develop new curricula and teaching resources for reading and to train TTI lecturers in teaching early grade reading. For in-service teacher training programs, the project trains teachers at all grade levels in instructional strategies to develop literacy at the primary and junior-secondary school levels. Additionally, Module 3 training especially focuses on early grade reading skills by using the graded reading books that have been developed with Yayasan Literasi Anak Indonesia (Indonesian Children's Literacy Foundation [YLAI]). A number of selected non-partner schools within the project partner districts will also receive graded reading kits and training on the early grade reading module.

Component 2: Develop better management and governance in schools and districts. The project works with partner districts to develop policies on reading and literacy and to allocate funds to procure reading books for schools. The school management training addresses ways to support improvements in early grade teaching of reading, as well as in promoting reading culture and developing reading facilities.

Component 3: Support better coordination within and between schools, TTIs, and the government at all levels. The project is coordinating with the central, provincial, and district governments, as well as with TTIs, on reviewing current practices and resources and developing policies and initiatives to support improved student reading. At the Ministry of Education and Culture's (MOEC's) request, the project is currently identifying project partner districts with good commitments for developing and promoting a literacy culture.

Apart from the above, the project has established the United States–Indonesia TTI Partnership between Florida State University and Universitas Negeri Semarang to develop, pilot, and roll out curricula and courses for pre- and in-service teacher training in developing reading and literacy, especially in the early grades.

I Introduction



Students of SDN 4 Baharu, South West Aceh, Aceh, read before taking the EGRA assessment.

USAID emphasizes the importance of early grade reading in Goal One of its Education Strategy (2011) for “Improved **reading skills** for 100 million children in primary grades by 2019.” To support the achievement of this global goal, the USAID PRIORITAS project has a particular focus on supporting the development and improvement of reading in the early grades in Indonesia. The project’s target is to increase the following:

- The proportion of students in Indonesia who, by the end of two grades of primary schooling, demonstrate that they can read and understand the meaning of grade level text; and
- The proportion of students in Indonesia who, by the end of the primary cycle, are able to read and demonstrate understanding as defined by a country curriculum, standards, and national experts.

To best meet these targets, the USAID PRIORITAS project collected data on the reading achievement of children in the early grades as well as the performance of teachers in Cohort 2 project areas in 2013 (baseline survey) and again two years later in 2015 (midline survey).

The EGRA findings from Cohort 1 and Cohort 2 project districts have been used to guide the early grade literacy teaching resources (developed by the project partner TTIs), as well as the literacy training module for the early grades, using the graded readers developed with YLAI. While the early grade resources and training aim to improve students’ literacy skills, other programs such as those for management and governance at the school and district levels, as well as advocacy and book supply programs, are aimed at developing a better reading program and promoting a reading culture.

This report presents and discusses the impact of project interventions for early grade reading in Cohort 2 schools two years after beginning implementation (midline survey). The methodology of the midline EGRA instrument and survey design is detailed in Section 2. Section 3 provides overall information about any improvements within and across sampled groups to determine the impact of the USAID PRIORITAS intervention within several demographic categories, taking into account changes across time and across sampled groups. Section 4 presents findings on how well teachers are teaching reading and the relationship to student performance at midline. Section 5 discusses the project’s various programs relating to early grade reading.

2 Methodology

Using the EGRA, USAID PRIORITAS worked with local stakeholders to assess grade 3 students' reading skills across a variety of essential areas of literacy. EGRA does not assess a specific curriculum, but instead measures the rate at which students are developing critical skills that they must acquire to learn to read successfully. The assessed skills are those that research has found to be predictive of later reading ability and that can be improved through effective teaching.

2.1 Revision of the Early Grade Reading Assessment for Cohort 2 Midline

2.1.1 The Instrument and Protocol

The EGRA instrument and protocol used for Cohort 2 midline was the same one as used at Cohort 1 midline. This instrument was different from the one used at Cohort 2 baseline; however, the revisions were made to ensure the security of the EGRA instrument, yet keeping a similar level of difficulty. Table 3: explains the subtask types used at midline for Cohort 2. For the Bahasa Indonesia language version of the instrument, see Annex 1.

Table 3: Cohort 2 Early Grade Reading Assessment Components at Midline

#	Subtask	Students must...	Reading Skill
1	Letter Name Knowledge (CLPM)	Provide the name of 100 upper- and lowercase letters presented in random order. Timed at 1 minute.	The ability to read the letters of the alphabet naturally and without hesitation.
2	Familiar Word Reading (CWPM)	Read 50 individual words common to grade level text. Timed at 1 minute.	The ability to read high-frequency words to assess whether children can automatically recognize words.
3	Invented Word Reading (CIWPM)	Read 50 individual invented words with common grade-level orthographic pattern. Timed at 1 minute.	The ability to apply knowledge of the relationship between sounds and symbols to decode words rather than reading words from memory.
4a	Oral Reading Fluency (ORF)	Read a narrative text of 57 words. Timed at 1 minute.	The ability to read connected text with accuracy, little effort, and at a sufficient rate of speed.
4b	Reading Comprehension (5)	Respond to 5 questions (3 literal and 2 inferential) about the entire text or parts they have read; 15 seconds to start to answer each question.	The ability to make meaning from (understand) what they have read.
5	Listening Comprehension (3)	Listen to a connected text of 30 words and respond correctly to 3 questions (2 literal and 1 inferential)—15 seconds to start to answer each question.	The ability to make sense of oral language (considered a necessary skill for reading comprehension).

CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

An EGRA adaptation workshop was held on September 9–12, 2014, in Jakarta, with an adaptation team of project staff and EGRA consultants who had been involved in the EGRA adaptation since the beginning of the project. Changes made to the subtasks are as follows:

The letters in subtask 1 were randomized, and some letters were changed to show a better balance between upper and lower cases. Most of the familiar words in subtask 2 were

replaced. The words were selected from the list of 159 most common words found in early grade texts. The invented words in subtask 3 were randomized. A few words were replaced by words used that had been used in the national EGRA.⁷ Three new reading and three new listening passages, initially developed at the national EGRA workshop in April 2014, were further revised and piloted on September 11, 2014, at a school with 48 grade 3 students. One reading passage and one listening passage were selected to be used in quarter 4, 2014, with Cohort 1 EGRA Midline, Cohort 3 EGRA Baseline, as well as Cohort 2 Midline. During the adaptation, care was taken with the length of the passages, the syntax, word difficulty, and the number and type of questions, to ensure consistency with the instrument used previously. As an extra precaution, the two reading passages used at baseline and midline were equated in the analysis.

The midline and baseline reading passages in subtask 4a in Cohort 2 were administered on November 11, 2014, to 48 grade 3 students attending a school in South Jakarta and on March 3 and 4, 2016, to 98 grade 2 students attending four schools in two districts in Banten and West Java. The performance on each reading passage for all 146 students was analyzed. On the baseline passage, these assessed students correctly scored, on average, 59.5 WPM with a standard error of 2.96; on the midline passage, these same students correctly scored an average of 52.1 WPM with a standard error (SE) of 2.77. Due to these differences in the baseline and midline reading passages, midline oral reading fluency (ORF) scores were adjusted to be on the same scale as the baseline oral reading assessment via a piece-wise linear equating approach.⁸ These adjusted ORF scores are used for all analyses in this report. Students scoring zero on the midline assessment were equated to baseline results with a zero score. Students with scores above zero on the midline assessment were equated to baseline scores using the following equation:

$$orf_{\text{equated to baseline}} = \frac{2.96}{2.77} * (orf_{\text{midline}} - 52.1) + 59.5$$

⁷ USAID Indonesia. 2014. *Indonesia 2014: The National EGRA and Snapshot of School Management Effectiveness Survey*, prepared by RTI International; available at <https://www.eddataglobal.org/documents/index.cfm?fuseaction=pubDetail&id=680>

⁸ The term piece-wise linear equating approach indicates two equating approaches were used, based on students' midline ORF scores. Students were divided into two groups: (1) students with a zero midline ORF and (2) students scoring above a zero midline ORF. Students in the first group were equated to baseline ORF with zero values. Students in the second group were equated with linear equating to maintain the mean and standard error of the baseline ORF assessment.

2.1.2 EGRA Assessor Training

The national assessor training for EGRA was conducted on October 7–8, 2015, in Jakarta for 62 EGRA assessors, seven EGRA field coordinators, and 10 supervisors from the seven provinces (see Table 4). Assessors were mostly student teachers, some university lecturers, teachers, and principals. Most of the assessors had participated in the previous EGRA data collection; there were only 13 new assessors replacing those who were not available. The instrument used was the same as in the past year at Cohort 1 midline; therefore, most assessors were familiar with it. The two-day training focused on collecting feedback from the previous implementation, as well as included discussions on each subtask, drawing from the assessors' experiences in the field. A list of assessors is provided in Annex 3.



EGRA assessor training in Jakarta in October 2015.

Project-produced in-house training videos were used during the entire training. These videos show the types of errors and behaviors that are frequently seen in EGRA administrations. To ensure a standardized assessment and reliable data, the training also included one formal check of inter-rater reliability test (IRR), where all participants assessed the same student, uploaded their data for analysis, and compared and discussed their results. Only a very few number of assessors did not participate in the data collection because their assessment results were beyond the rates of agreement.

Table 4: EGRA Assessor Training Participants

Province	No. of Assessors	No. of Supervisors	No. of Field Coordinators
Aceh (4 districts)	10	1	1
North Sumatra (2 districts)	8	1	1
Banten (2 districts)	8	1	1
West Java (4 districts)	10	2	1
Central Java (2 districts)	8	1	1
East Java (2 districts)	8	2	1
South Sulawesi (4 districts)	10	2	1
TOTAL (20 districts)	62	10	7

In addition to the same 7.2-inch Samsung Galaxy tablets that had been used previously, Nexus II tablets acquired from the national EGRA were also used to record the data from the tests and interviews.

2.1.3 Provincial EGRA Refresher Training

Two-day refresher training at the provincial level was conducted to prepare and to review the main points of EGRA implementation procedures prior to data collection at schools. To ensure quality standards, each provincial refresher training was supported by one project national EGRA staff member, who participated in the pilot test on the second day of the training, as well as in data collection in the first school on the third day. A reflection session following the first school data collection was held to discuss feedback. Each team of EGRA assessors was accompanied by a supervisor and/or coordinator. Data was uploaded daily whenever possible. All data was collected using Tangerine[®] on the Samsung and Nexus tablets.

2.2 The Survey Design

Similar to the Cohort 1 baseline, the EGRA data at midline was collected for grade 3 students in the same schools. A list of all schools participating in the project’s EGRA at midline is included in Annex 2. The EGRA-sampled partner and comparison schools are the same schools selected by the monitoring and evaluation (M&E) team for their collection of the classroom observations and school data.

The project partner districts and schools were not chosen at random, but were selected in cooperation with local stakeholders and according to a specific project criteria agreed on with USAID and Indonesian Government counterparts. To ensure a representative sample of different types of schools (secular, religious, private, and public) and for maximum comparability, multistage sampling was used where four project schools were randomly selected from within a project-determined cluster of six to eight schools. Within each school, the assessment was given to a random sample of, in most cases, 24 students (12 girls and 12 boys) selected from the grade 3 roster. The sample design is presented in Table 5: below.

Table 5: Survey Design

Grade Level	Grade 3 (Semester 1)
Geographic Areas	All Cohort 2 USAID PRIORITAS project districts (7)
Institution Type	All types of primary schools (secular and religious, public and private); representational sample of each type
School Sample	Eight project schools per district: four partner schools and four comparison schools
Membership	Maximum of 24 students per school: 12 girls and 12 boys (when possible)
Sampling Plan	Multistage sampling: representational sample of schools, selected with certainty; random selection of students

Despite the efforts to ensure that the sampled schools represented a range of schools in terms of their location and school type, the final sample between the partner and comparison schools may not be evenly distributed. The distribution of the school sample by select characteristics is presented in Table 6:

Table 6: Characteristics of the Overall School Sample

Province	Total	Characteristics					
		Urban	Rural	Public	Private	Secular	Religious
Aceh (4 districts)							
Comparison	16	5	11	16	0	12	4
Partner	16	8	8	16	0	12	4
North Sumatra (2 districts)							
Comparison	8	0	8	8	0	7	1
Partner	8	4	4	7	1	6	2
Banten (2 districts)							
Comparison	8	2	6	4	4	4	4
Partner	8	4	4	4	4	5	3
West Java (4 districts)							
Comparison	16	8	8	12	4	12	4
Partner	16	8	8	14	2	12	4
Central Java (2 districts)							
Comparison	8	5	3	5	3	6	2
Partner	8	4	4	5	3	6	2
East Java (2 districts)							
Comparison	8	4	4	7	1	6	2
Partner	8	4	4	7	1	6	2
South Sulawesi (4 districts)							
Comparison	16	6	10	15	1	15	1
Partner	16	9	7	15	1	13	3
Total (20 districts)							
Comparison	80	30	50	67	13	62	18
Partner	80	41	39	68	12	60	20

2.3 Data Collection

EGRA data was collected during the period from November 4 to November 28, 2015. A total of 3,555 students (49.7% or 1,768 boys and 50.3% or 1,787 girls) in 160 partner and comparison schools in Cohort 2 participated in the midline assessment. Across baseline and midline, data was collected from a total of 7,129 grade 3 students in 160 schools across 20 districts in 7 provinces. Of these schools, 76.3% are secular, and the remaining schools are religious (reflecting the proportion of these types of schools in the project). Characteristics of the Cohort 2 baseline and midline student sample are illustrated in Table 7: The EGRA implementation schedule can be found in Annex 4.

Table 7: Characteristics of the Overall Baseline and Midline Student Sample

Province	Total Students	Characteristics					
		Urban	Rural	Public	Private	Secular	Religious
Aceh (4 districts)							
Comparison	704	357	347	356	348	229	475
Partner	681	335	346	337	344	340	341
North Sumatra (2 districts)							
Comparison	315	164	151	158	157	0	315
Partner	384	192	192	197	187	192	192
Banten (2 districts)							
Comparison	370	182	188	184	186	96	274
Partner	383	191	192	192	191	191	192
West Java (4 districts)							
Comparison	759	384	375	376	383	384	375
Partner	764	381	383	381	383	384	380
Central Java (2 districts)							
Comparison	387	195	192	192	195	243	144
Partner	377	185	192	186	191	192	185
East Java (2 districts)							
Comparison	346	168	178	168	178	181	165
Partner	348	177	171	178	170	192	156
South Sulawesi (4 districts)							
Comparison	626	318	308	316	310	201	425
Partner	685	345	340	351	334	416	269
Total (20 districts)							
Comparison	3,507	1,768	1,739	1,750	1,757	1,334	2,173
Partner	3,622	1,806	1,816	1,822	1,800	1,907	1,715

2.4 Study Limitations



Students waiting at a primary school in South Sulawesi, reading books before the assessment.

Several limitations to this study are discussed below. These limitations may have influenced the findings, although attempts had been made to minimize them where possible.

Sample selection. Cohort 2 schools where EGRA was administered, were selected by the project according to selection criteria that included commitment to the project and accessibility to local universities. Moreover, the multistage sampling employed in selecting the schools

reduced the overall randomness of the sample. Thus, the results presented in this report represent **only** the students in the sampled schools. It is not intended to be representative of either the districts, provinces, or the country.

In addition, the set of sample partner schools and comparison schools differed for certain demographic characteristics within provinces (for example, number of urban schools). These imbalances could result in biased estimates and possibly reduce the potential to detect the impact of the USAID PRIORITAS intervention. To account for this imbalance, all analyses in the report are calculated within demographic groups; for example, students attending urban schools at midline are only compared with students that attended urban schools at baseline. Also, regression modeling was employed to determine the impact of the intervention when controlling for known demographic features.

Self-reporting. Attempts were made to collect some of the student data from their class teacher. The data included students' study period, date of birth, and whether they were studying in a multigrade class. Additional information needed to be collected from students themselves. The young age of the students, and the context in which the questionnaires were given, may have reduced reliability. For example, when asked if they were reading books at home with their parent(s) or an adult at the home, they may have interpreted reading together with parents as parents helping them to read.

Instrument. Although in developing and adapting the subtasks, especially the reading passage, care was taken with the length of the passages, the syntax, word difficulty, and the number and type of questions, to ensure consistency with the instrument used previously, and although the passages were equated in the analysis, it is extremely difficult to have two passages that are of equal level of difficulty.

3 How Well Children in Cohort 2 Are Reading at Midline within and across Sampled Groups

This section explores the change in grade 3 student performance that has occurred in comparison and partner schools since the baseline EGRA assessment was conducted two years prior. The results are generally reported by detailing overall achievement within and across each sample group⁹ and within subgroup, such as for gender, school type, and pre-school experience, over time. The results, including percentages and frequencies, can be interpreted as representative of the students in the sample schools. As previously explained, the project did not draw a simple random sample of the population of students in each group of interest.



Students at MIN Tanjung Mulia, Langkat, North Sumatra, stand in rows during the student sampling process.

This section also explores DID analyses to discover improvements over time within the partner schools relative to that of the comparison schools. DID analyses presented in this section were conducted under the assumption that treatment groups were balanced and that comparison schools were controlled (i.e., abstained from any treatment). It is possible that improvements in the partner and comparison schools are not entirely due to the USAID PRIORITAS intervention because of unequal sample distributions between partner and comparison school characteristics. As was previously explained, the project did not draw a simple random sample of the population of students in each group of interest. In addition, many districts have been viewing the training by USAID PRIORITAS as an example for all schools to follow. In addition to dissemination training from USAID PRIORITAS, comparison schools also received other similar training from the GOI or other donors or foundations. The data collected by the project monitoring team show that 51.6% of the principals and teachers of comparison schools had received some type of training. This section presents summary statistics for all subtasks of the EGRA conducted by the project.

In this study, results are reported for an analysis of 7,129 children (3,622 in partner schools: 1,806 baseline, 1,816 midline; 3,507 in comparison schools: 1,768 baseline, 1,739 midline). This report section is devoted to a comparison of the average subtask scores between Cohort 2 at baseline and midline within and across partner and comparison schools and presents summary statistics for all subtasks of the EGRA conducted by the project at baseline and midline.

⁹ There were two sample groups in the study, i.e., one sample group of partner schools and one sample group of comparison schools.

3.1 Summary Scores

3.1.1 Overall Summary Scores

For Cohort 2, the grade 3 students in partner schools could identify, on average, 1.5 more letters in one minute at midline than at baseline; grade 3 students in comparison schools could identify, on average, 2.1 more letters in one minute at midline compared to baseline. Students' increased proficiency of letter sounds contributed to significant improvement from baseline to midline in the invented word, reading comprehension, and listening comprehension subtasks, both for partner and comparison schools.

For invented words in isolation, students in grade 3 read an average of 5 more invented words per minute at midline than at baseline. Grade 3 students in partner schools averaged 40.4 invented words per minute at midline, and in comparison schools averaged 38.8 invented words per minute at midline. For text passage reading, children maintained average reading speeds from baseline to midline with partner school students continuing to outperform comparison school students. Based on baseline data, children in partner schools read on average around 74.8 WPM with a 95% confidence interval of 73.6 to 76.0 WPM compared to comparison school students, who read around 69.4 WPM on average with a 95% confidence interval of 68.4 to 70.4 WPM. At midline, students' reading speeds fell well within the 95% confidence intervals from the baseline report for the respective sample group; children in partner schools read on average 73.5 WPM and children in comparison school students read on average 70.0 WPM.

Both in partner and comparison schools at midline, students' ability to understand what they had read averaged above 3.7 out of 5 questions (or 74% correct), with 65.7% of students able to score 80% on reading comprehension in comparison schools and 72.8% of students scoring 80% in partner schools. This is an increase of at least 13% in percentage of students able to answer 4 out of the 5 reading comprehension questions correctly, when compared between the partner and comparison schools. Listening comprehension scores also increased similarly between partner and comparison schools, with students scoring on average 1.6 correct answers out of 3 in partner schools at baseline (1.5 in comparison schools) and an average of 2.6 correct answers out of 3 in partner schools at midline (2.6 in comparison schools). These results are detailed in Table 8: below.

Overall, the scores on all five reading skills suggest that the children's Indonesian language skills are influencing their ability to understand connected text. Similar to baseline results, at midline, students in partner and comparison schools demonstrated mastery of the pre-reading skills of letter name knowledge, familiar word reading, and invented word decoding. Unlike baseline results, at midline students in partner and comparison schools demonstrated an increased ability to understand connected text as measured by the listening comprehension subtask.

Table 8: Summary of Overall Mean Scores by Subtask

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Letter Name Knowledge (CLPM)	Comparison	83.78 (0.43)	85.83 (0.51)	-0.57	0.54	-0.02
	Partner	85.71 (0.47)	87.2 (0.45)			
Familiar Word Reading (CWPM)	Comparison	65.05 (0.49)	66.85 (0.57)	-0.49	0.65	-0.02
	Partner	69.49 (0.57) ⁺⁺	70.79 (0.53) ⁺⁺			
Invented Word Decoding (CIWPM)	Comparison	33.12 (0.31)	38.78 (0.42) ^{**}	-0.19	0.79	-0.01
	Partner	34.89 (0.35) ⁺	40.35 (0.36) ^{**}			
Oral Reading Fluency (ORF)	Comparison	69.43 (0.52)	69.69 (0.58)	-1.54	0.18	-0.05
	Partner	74.77 (0.62) ⁺⁺	73.49 (0.58) ⁺⁺			
Reading Comprehension (5)	Comparison	3.21 (0.03)	3.71 (0.03) ^{**}	0.03	0.63	0.02
	Partner	3.41 (0.03) ⁺⁺	3.93 (0.03) ^{++ **}			
Listening Comprehension (3)	Comparison	1.5 (0.02)	2.55 (0.01) ^{**}	-0.1	< 0.01	-0.12
	Partner	1.6 (0.02) ⁺	2.56 (0.01) ^{**}			
80% or Better on Reading Comprehension	Comparison	52.05% (0.94)	65.73% (0.93) ^{**}	0.04	0.07	0.07
	Partner	55.59% (1.09)	72.78% (0.93) ^{++ **}			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

At baseline, students in partner schools scored better than their counterparts in comparison schools in all subtasks; this difference was significant in all but the letter name knowledge subtask. With the exception of letter name knowledge, invented word decoding, and listening comprehension, students in partner schools continued to score significantly better than their counterparts in comparison schools at midline. Both partner and comparison school students achieved higher scores at midline for five of the six subtasks; these gains were significantly higher on invented word decoding, reading comprehension, and listening comprehension. Students in comparison schools demonstrated slightly greater increases in scores on listening comprehension from baseline to midline, as evident in the negative effect size detailed in Table 8: Although this difference is statistically significant, an increase of +1.1 correct answers and +1.0 correct answers does not represent a difference contextually. No other significant DID differences over the two years emerged.

These results may suggest that any impact of the USAID PRIORITAS intervention could be obscured by some unknown factor. This might be partly attributable to the distributions of sampled schools. It could also be explained by other intervention programs, including dissemination training provided by the project and other forms of training by the GOI or other entities. On average, students in comparison and partner schools significantly improved in invented word decoding, reading comprehension, and listening comprehension subtasks. While students in comparison schools continued to score, on average, significantly lower than students in partner schools at midline, comparison school students improved at a higher or similar rate than students in partner schools. This trend is demonstrated in Figure 1: for the letter name knowledge, oral reading fluency, reading comprehension, and listening comprehension subtasks. The initial difference between the partner and

comparison school samples highlights the fact that these two groups of students were not similar. However, the similar improvement trend in both groups could be because students in comparison schools started at a lower point and, therefore, had further to grow. Because of improvements observed both in the partner and the comparison groups, it is difficult to determine the exact cause of student improvement. It could be that significant improvements need more time to be observed, as the third round of training, which specifically focuses on early grade literacy, is yet to be implemented in early 2016. The cascade training model involving three levels of training from the national to the school level requires time to be implemented, and more time is required for the results to become evident in schools.

Figure 1: Baseline and Midline Mean Scores on Selected Subtasks



The percentage of children who scored zero on a subtask was low at baseline and continued to decrease at midline for most reading skills in each sample group, with the exception of oral reading fluency. Table 9: shows the percentages of zero scores, which represent the percentage of students in grade 3 who were unable to record¹⁰ the name of a single letter; read a single word, either isolated or in a connected text; or answer one question about a simple story. At baseline, partner schools and comparison schools were similar in the proportion of students who scored zero on a given subtask. At midline, partner schools had fewer students scoring zero on all six subtasks compared to comparison schools.

Based on this data, at most 0.21% of students did not know a single letter name at midline. Invented word decoding and reading comprehension subtasks proved to have the highest

¹⁰ The subtasks are discontinued if a child does not score any correct answers in the first row of the letters and words.

percentage of zero scores, where almost 6.5% of comparison school students and just under 5% of partner school students were unable to decode an invented word or answer any of the reading comprehension questions correctly.

The greatest reduction in zero scores was observed for the listening comprehension subtask. At baseline, the highest percentage of zero scores was for the listening comprehension subtask, where almost 18% of comparison school students and around 14% of partner school students were unable to correctly answer any of the three questions after listening to a simple story. By midline, these percentages dropped significantly to less than 2%. DID analysis revealed that decreases between partner and comparison schools from baseline to midline were significant for the listening comprehension subtask.

Table 9: Percentage of Students with Zero Scores by Subtask

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Letter Name Knowledge (CLPM)	Comparison	0.39% (0.14)	0.21% (0.06)	0	0.88	0.01
	Partner	0.34% (0.1)	0.19% (0.07)			
Familiar Word Reading (CWPM)	Comparison	4.48% (0.35)	2.74% (0.22)**	0.01	0.08	0.06
	Partner	2.83% (0.31) ⁺	2.12% (0.3)			
Invented Word Decoding (CIWPM)	Comparison	8.04% (0.45)	6.3% (0.36)	0.02	0.06	0.07
	Partner	5.06% (0.4) ⁺⁺	4.96% (0.49)			
Oral Reading Fluency (ORF)	Comparison	3.35% (0.28)	3.85% (0.28)	0	0.83	0.01
	Partner	2.47% (0.32)	3.11% (0.36)			
Reading Comprehension (5)	Comparison	9.85% (0.5)	6.44% (0.36)**	0.02	0.06	0.06
	Partner	6.19% (0.47) ⁺⁺	4.41% (0.39) ⁺			
Listening Comprehension (3)	Comparison	17.76% (0.71)	1.69% (0.22)**	0.03	< 0.01	0.13
	Partner	14.24% (0.73) ⁺	1.62% (0.2) ^{**}			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Generally, most of the DID p-values are not significant for the subtasks, but the table supports that partner schools have lower zero scores than comparison schools. Because these are the literacy skills that children learn in the first few years of school, these results show that only a minimal number of children have not acquired the foundational skills for successful learning.

3.1.2 Summary Scores by Province

At baseline, students in Banten, West Java, Central Java, and East Java provinces scored better, on average, when compared with students in the other three provinces of Aceh, North Sumatra, and South Sulawesi, except for oral reading fluency, where North Sumatra scored within the ranges of the better performing provinces. By midline, North Sumatra had caught up with the better performing provinces. However, Aceh and South Sulawesi continue to struggle to make progress in education, compared to other provinces. These results are detailed in Table 10:

Among the seven provinces, North Sumatra saw the most significant gains for students in partner schools. Across all subtasks, North Sumatra showed positive DID effect sizes that indicated partner school students improved at a higher rate than comparison school students over time; these results were significant for letter name knowledge, invented word decoding, and reading comprehension. South Sulawesi also demonstrated a positive effect due to the USAID PRIORITAS intervention in all subtasks; however, those values had not improved significantly.

Notably, all provinces produced increases from baseline to midline in reading comprehension and listening comprehension scores, regardless of sampled group. However, a few oddities emerged. In Aceh, the comparison schools demonstrated strong increases in every subtask, such that at midline, students in the sampled comparison schools performed similarly to students in the sampled partner schools. This trend occurred because some of the project facilitators are from the comparison schools; therefore, they may have implemented the good practices in their schools that they had acquired from their facilitator training. In East Java, average scores decreased at midline for all non-comprehension subtasks, regardless of sampled group. DID effect sizes indicate that comparison school students experienced a smaller decrease in scores on every non-comprehension subtask compared to partner school students, often resulting in higher midline averages for comparison school students.

Table 10: Summary Mean Results by Province

	Subtask	Aceh	North Sumatra	Banten	West Java	Central Java	East Java	South Sulawesi
Letter Name Knowledge (CLPM)								
Baseline	Comparison	69.79	80.02	91.8	89.95	97.25	91.69	75.75
	Partner	73.24	80.9	89.22	92.87	95.17	95.04	81.48 ⁺⁺
Midline	Comparison	73.66	80	90.56	88.22	102.01	91.47	81.28 [*]
	Partner	74.31	89.69 ^{++ **}	87.17	91.55	95.57 ^{++ **}	87.73	88.06 ^{++ **}
DID	Estimate	-2.8	8.8 [#]	-0.82	0.41	-4.35	-7.09	1.06
	Effect Size	-0.11	0.4	-0.04	0.02	-0.18	-0.34	0.04
Familiar Word Reading (CWPM)								
Baseline	Comparison	45.49	57.82	77.32	75.47	74.07	82.47	52.41
	Partner	56.19 ⁺⁺	71.53 ⁺⁺	72.81	79.53	65.47 ⁺⁺	84.6	60.17 ⁺⁺
Midline	Comparison	56.36 [*]	57.84	70.09	72.89	76.65	76.04 [*]	58.07
	Partner	57.33	76.21 ^{++ **}	73.95	76.91	71.56	73	67.36 ^{++ **}
DID	Estimate	-9.73 [#]	4.66	8.38	-0.03	3.51	-5.16	1.54
	Effect Size	-0.33	0.17	0.37	0	0.13	-0.23	0.04

	Subtask	Aceh	North Sumatra	Banten	West Java	Central Java	East Java	South Sulawesi
Invented Word Decoding (CIWPM)								
Baseline	Comparison	21.07	26.08	38.79	39.79	38.9	45.64	26.49
	Partner	27.34 ⁺⁺	32.21 ⁺⁺	37.41	41.53	32.85 ⁺⁺	44.79	30.04 ⁺⁺
Midline	Comparison	30.57 [*]	29.31	42.8	43.47 [*]	43.06	48.94	31.37 [*]
	Partner	31.68	42.23 ^{++ **}	42.91	45.62	41.09	42.34 ^{++ **}	36.65 ^{++ **}
DID	Estimate	-5.15	6.79 [#]	1.49	0.4	4.08	-5.75	1.74
	Effect Size	-0.29	0.44	0.1	0.02	0.22	-0.37	0.09
Oral Reading Fluency (ORF)								
Baseline	Comparison	47.35	59.48	80.66	79.26	81.28	97.72	54.06
	Partner	60.7 ⁺⁺	75.88 ⁺⁺	79.83	84.91	73.34 ⁺⁺	91.79	63.2 ⁺⁺
Midline	Comparison	57.67 [*]	55.84	74.92	75.64	80.12	88.69 [*]	55.15
	Partner	60.08	79.71 ^{++ **}	77	80.26	75.95	79.49 ^{++ **}	64.98 ^{++ **}
DID	Estimate	-10.95 [#]	7.47	2.92	-1.03	3.77	-3.27	0.69
	Effect Size	-0.34	0.27	0.12	-0.04	0.12	-0.13	0.02
Reading Comprehension (5)								
Baseline	Comparison	2.33	2.83	3.65	3.54	3.84	4.03	2.78
	Partner	2.95 ⁺⁺	3.23	3.62	3.67	3.81	3.77	3.14 ⁺⁺
Midline	Comparison	3.17 [*]	3.25	4.02 [*]	3.85 [*]	4.11 [*]	4.54 [*]	3.14 [*]
	Partner	3.41	4.24 ^{++ **}	4.06	4.14 ^{+ *}	3.96	4.33	3.57 ^{++ **}
DID	Estimate	-0.37	0.59 [#]	0.07	0.16	-0.12	0.05	0.08
	Effect Size	-0.21	0.42	0.06	0.13	-0.09	0.05	0.04
Listening Comprehension (3)								
Baseline	Comparison	1.18	1.46	1.56	1.58	1.57	1.98	1.4
	Partner	1.44 ⁺	1.53	1.71	1.62	1.63	1.79	1.62 ^{**}
Midline	Comparison	2.56 [*]	2.49 [*]	2.64 [*]	2.59 [*]	2.44 [*]	2.78 [*]	2.27 [*]
	Partner	2.53	2.62	2.65	2.63	2.45	2.64	2.34
DID	Estimate	-0.3 [#]	0.06	-0.14	0	-0.04	0.05	-0.16
	Effect Size	-0.32	0.08	-0.21	0	-0.05	0.07	-0.16

	Subtask	Aceh	North Sumatra	Banten	West Java	Central Java	East Java	South Sulawesi
80% or Better on Reading Comprehension								
Baseline	Comparison	31.43	43.11	60.74	60.95	68.07	72.48	40.7
	Partner	44.89 ⁺	45.72	65.69	63.05	62.74	59.85	51.49 ⁺⁺
Midline	Comparison	48.77 [*]	53.58	77.16 [*]	68.47	76.65	89.85 [*]	51.1 [*]
	Partner	62.5 ^{++ **}	79.84 ^{++ **}	74.05	80.16 ^{+ *}	73.47	82.32	60.13
DID	Estimate	0.28	23.65 ^{##}	-8.06	9.58	2.15	5.1	-1.75
	Effect Size	0.56	51.26	-20.17	21.54	4.2	12.35	-3.19

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

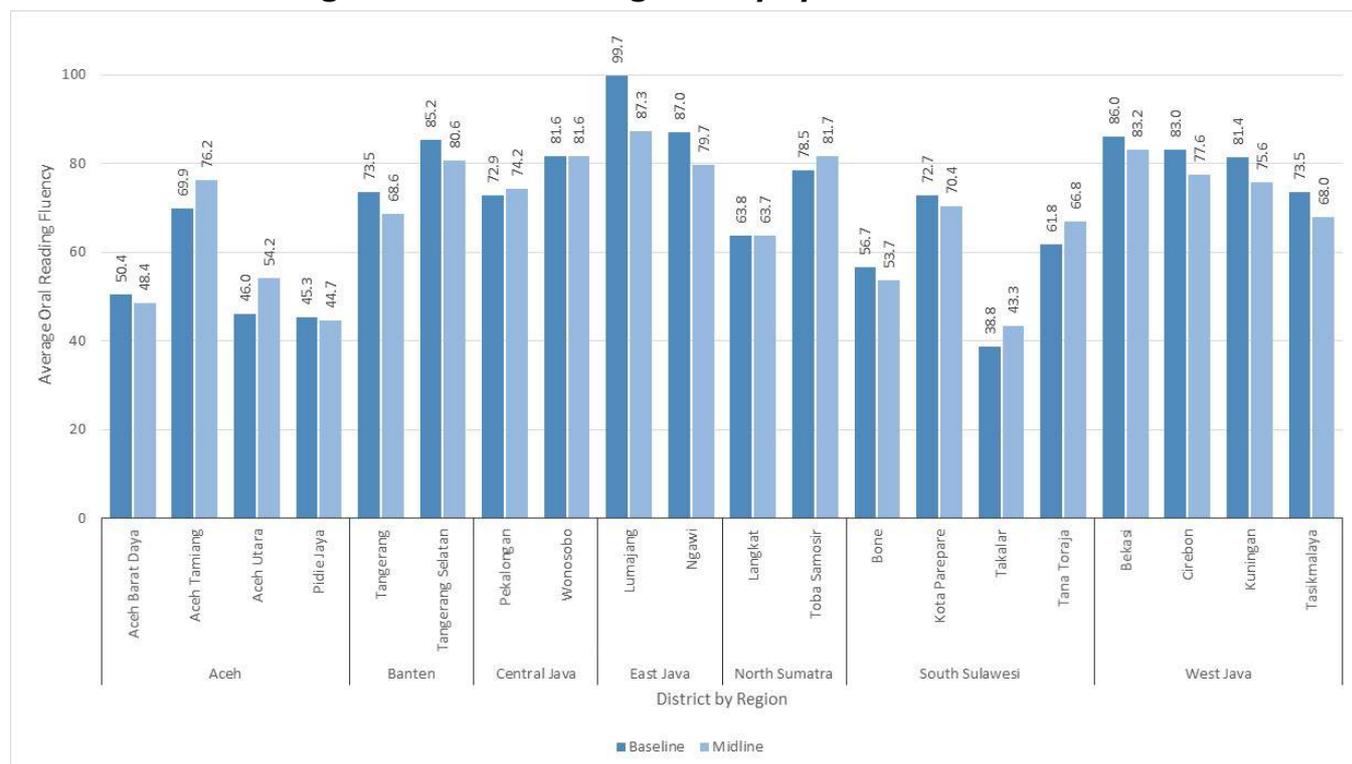
p<0.001, ## p<0.0001; significant differences across treatment groups and time (DID).

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

3.1.3 Oral Reading Fluency by District

To better understand the reading speeds of students within each region, average reading speeds were examined within each district at baseline and midline, without respect to treatment group. These results are detailed in Figure 2. Of the 20 districts, six districts saw an average increase in student reading speeds from baseline to midline; the largest increase was +8.2 WPM observed in Aceh Utara, Aceh. Overall districts in Aceh, Central Java, and North Sumatra, saw increases of at least +1.3 WPM and minimal decreases of at most -1.9 WPM. All districts in Banten, East Java, and West Java saw decreases from baseline performance between -2.8 WPM and -12.4 WPM at midline. The largest decrease of -12.4 WPM was observed in Lumajang, East Java. In South Sulawesi, the results were more mixed at midline, with two districts reporting higher average reading speeds and two districts reporting lower average reading speeds. Despite these district level differences, Aceh and South Sulawesi continue to underperform compared with other regions, with none of their districts averaging 80 WPM at midline; all other regions had at least one district that reported average reading speeds of at least 80 WPM at midline.

Figure 2: Oral Reading Fluency by District



3.1.4 Summary Scores by Gender

In the baseline and midline Cohort 2 study, 48.2% of the overall study population were girls, and 51.8% were boys. In the sample group, 48.4% of children in the sample partner schools were girls, and 51.6% were boys. In the sample comparison schools, 48.0% of children were girls and 52% were boys.

From baseline to midline, boys and girls improved in every subtask, regardless of sampled group, with the exception of the oral reading fluency (ORF) subtask. ORF performance neither increased nor decreased for treatment group or gender. From baseline to midline, boys in comparison schools averaged slightly over 65 WPM; boys in partner schools averaged at least 69 WPM. Girls in comparison schools averaged approximately 74 WPM compared to those in partner schools, who averaged at least 78 WPM; this difference was significant. From this data, it is clear that students in the sampled schools were reading with proficiency at baseline and that this trend has continued at midline. For the other subtasks, boys and girls showed significant increases in invented word decoding, reading comprehension, and listening comprehension, regardless of treatment group. Table 11: provides details about the improvements in subtask scores from baseline to midline for each gender and by sampled group.

Table 11: Summary Mean Scores by Gender

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Boys						
Letter Name Knowledge (CLPM)	Comparison	82.99 (0.6)	84.42 (0.76)	-0.39	0.77	-0.02
	Partner	84.47 (0.67)	85.52 (0.6)			
Familiar Word Reading (CWPM)	Comparison	62.34 (0.69)	64.78 (0.87)	-0.46	0.77	-0.02
	Partner	66.64 (0.8) ⁺⁺	68.62 (0.8)			
Invented Word Decoding (CIWPM)	Comparison	31.44 (0.42)	36.98 (0.55) ^{**}	0.28	0.77	0.02
	Partner	32.74 (0.46)	38.57 (0.52) ^{**}			
Oral Reading Fluency (ORF)	Comparison	65.35 (0.72)	65.94 (0.85)	-1.95	0.24	-0.06
	Partner	70.32 (0.87) ⁺⁺	68.96 (0.84)			
Reading Comprehension (5)	Comparison	3.07 (0.04)	3.54 (0.04) ^{**}	0.05	0.53	0.03
	Partner	3.27 (0.04) ⁺	3.79 (0.04) ^{++ **}			
Listening Comprehension (3)	Comparison	1.42 (0.03)	2.59 (0.02) ^{**}	-0.15	< 0.01	-0.18
	Partner	1.52 (0.03)	2.55 (0.02) ^{**}			
80% or Better on Reading Comprehension	Comparison	48.62% (1.39)	62.05% (1.25) ^{**}	0.05	0.06	0.11
	Partner	51.84% (1.5)	70.52% (1.34) ^{++ **}			
Girls						
Letter Name Knowledge (CLPM)	Comparison	84.64 (0.61)	87.35 (0.67)	-0.73	0.58	-0.03
	Partner	87.02 (0.65)	89 (0.67)			
Familiar Word Reading (CWPM)	Comparison	68.02 (0.71)	69.07 (0.72)	-0.4	0.79	-0.01
	Partner	72.48 (0.81) ⁺⁺	73.13 (0.7) ⁺⁺			
Invented Word Decoding (CIWPM)	Comparison	34.97 (0.46)	40.71 (0.63) ^{**}	-0.63	0.55	-0.03
	Partner	37.15 (0.52)	42.26 (0.48) ^{**}			
Oral Reading Fluency (ORF)	Comparison	73.88 (0.74)	73.73 (0.77)	-0.93	0.56	-0.03
	Partner	79.46 (0.87) ⁺⁺	78.37 (0.8) ⁺⁺			
Reading Comprehension (5)	Comparison	3.36 (0.04)	3.88 (0.04) ^{**}	0.01	0.93	0.01
	Partner	3.55 (0.04) ⁺	4.08 (0.04) ^{+ **}			
Listening Comprehension (3)	Comparison	1.59 (0.02)	2.51 (0.02) ^{**}	-0.04	0.4	-0.05
	Partner	1.69 (0.03)	2.56 (0.02) ^{**}			
80% or Better on Reading Comprehension	Comparison	55.81% (1.24)	69.69% (1.37) ^{**}	0.02	0.52	0.04
	Partner	59.56% (1.59)	75.21% (1.27) ^{**}			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Students in partner schools, on average, outperformed students in comparison schools in familiar word reading, oral reading fluency, and reading comprehension within gender. By midline, boys in partner school continued to significantly outperform boys in comparison schools in reading comprehension. Girls in partner schools maintained significantly higher scores on all three subtasks than girls in comparison schools. Despite increased performance, the only noticeable differences in the rate of improvement between partner and comparison school students was observed for listening comprehension among boys.

3.2 Analysis by Subtask

In this section, results of each EGRA measure for each sampled group at baseline and midline will be presented with a brief interpretation, focusing on distributional shifts in student performance.

3.2.1 Letter Name Knowledge



A student doing subtask 1 (letter naming) at SDN Dawuhan Lor, Lumajang, East Java.

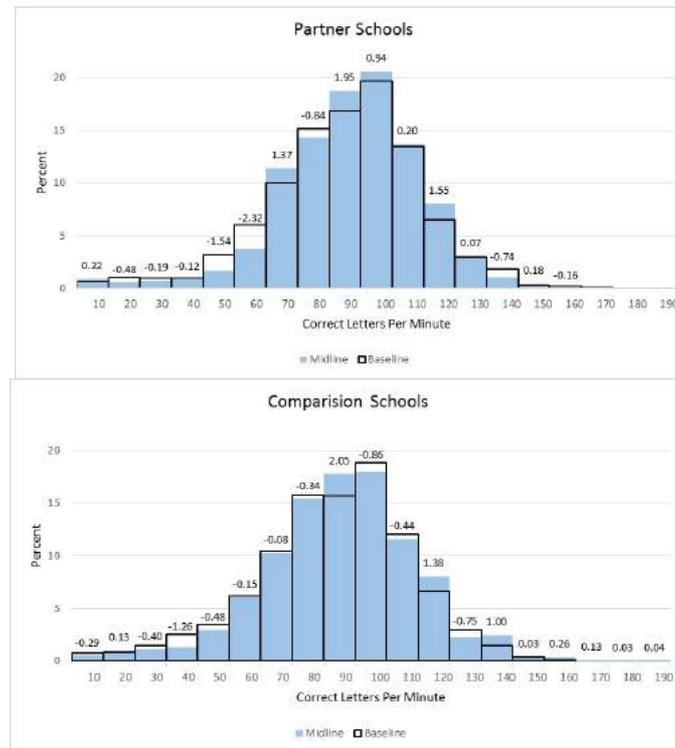
student could correctly identify within one minute.

Figure 3 presents students' fluency in identifying letters in grade 3 at baseline and midline within each sampled group. While both sampled groups experienced a distribution shift toward higher scores, the comparison schools had the largest percentage in increases for students scoring above 100 correct letters per minute. Within the 80–90 correct-letters-per-minute group, results at partner and comparison schools increased by roughly 2%. At midline, 18.8% of partner school students and 17.8% of comparison school students could identify between 80 and 90 correct letters per minute (CLPM). For the midline assessment, the proportion of students who could correctly identify at least 80 letters per minute was 67.0% in the partner schools and 62.6% in the comparison schools.

Regardless of time and treatment group, less than 1% of students were unable to correctly identify more than 10 correct letters per minute. Partner schools saw a 4.7% increase in students correctly identifying between 80 and 130 letters per minute (64.2% at midline); within this same range, comparison schools experienced a 1.4% increase (57.6% at midline). These results are an indication of clear and explicit instruction in schools about letter names and letter recognition.

The letter name knowledge subtask measures students' ability to identify letter names automatically. This is considered to be an important foundational skill, and high levels of fluency should be observed by the beginning of grade 2. Students were presented a chart with 100 random upper- and lower-case letters and were asked to identify as many as they could within one minute. Scores for this subtask are the number of letters the

Figure 3: Distribution of Sample Scores for Letter Name Knowledge



3.2.2 Familiar Word Reading



A student at SDN 4 Susoh, South West Aceh, Aceh, reading familiar words.

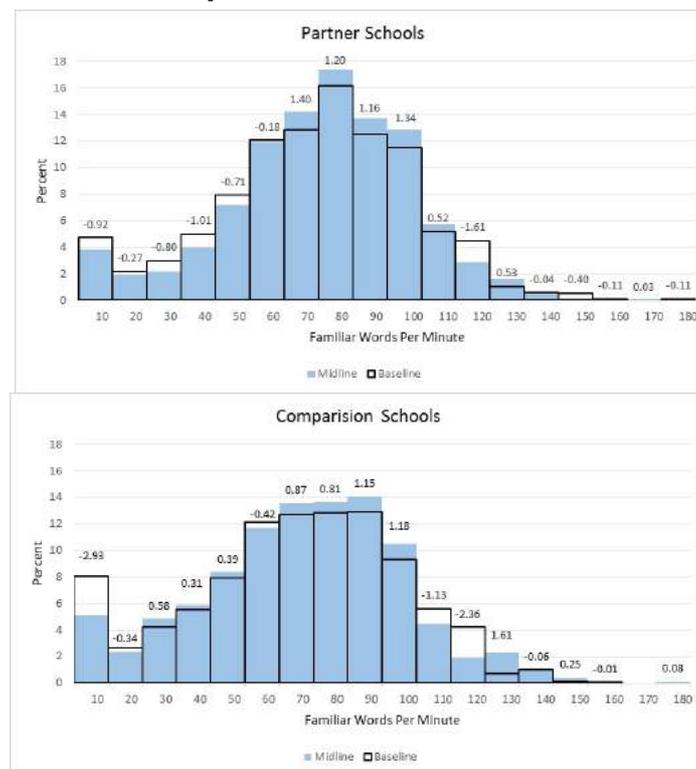
The familiar word reading subtask assesses the students’ ability to identify 50 written words presented in isolation in one minute. These are words that the students should already know or be expected to know. Although some students are scoring higher on the familiar word reading subtask at midline, the distribution of student scores showed little to no forward shift from baseline scores (see Figure 4: At baseline, the middle 50% of

partner school students scored between 52.6 (25th percentile) and 88.2 (75th percentile) familiar WPM; at midline, this shifted to 56.3 and 88.2 WPM. For comparison school students, the middle 50% scores shifted from 46.8 to 86.5 WPM at baseline to 49.0 and 86.5 WPM at midline. This indicates that over time more students both in partner and in comparison schools are reaching proficiency in reading familiar words in isolation.

While students in both sampled groups improved over time, partner school students experienced greater improvements in the number of students able to identify 60 to 110 WPM and continued to outperform students in comparison schools. At midline, 63.9% of

partner school students were able to identify 60 to 110 WPM, an increase of 5.6%; 56.2% of comparison school students were able to identify 60 to 110 WPM, an increase of 2.9%. Over time, the number of students able to identify less than 10 familiar WPM decreased in both sampled groups. In comparison schools, 5.1% of students were unable to identify less than 10 WPM; a decrease of 2.9% from baseline. In partner schools, 3.8% of students were unable to identify less than 10 WPM; a decrease of 0.9% from baseline.

Figure 4: Distribution of Sample Scores for Correct Familiar Words per Minute



3.2.3 Invented Word Reading

The EGRA invented-word reading subtask is intended to be a measure of how well students can “decode” words that seem invented. This subtask draws on a child’s ability to use their knowledge of the relationship between letters and their sounds to read invented words. Students were presented with a chart with 50 invented words that follow the orthographic structure of Bahasa Indonesia and were asked to read as many of the words as they could within one minute. Scores for this subtask were the number of invented words the student could correctly read within one minute.

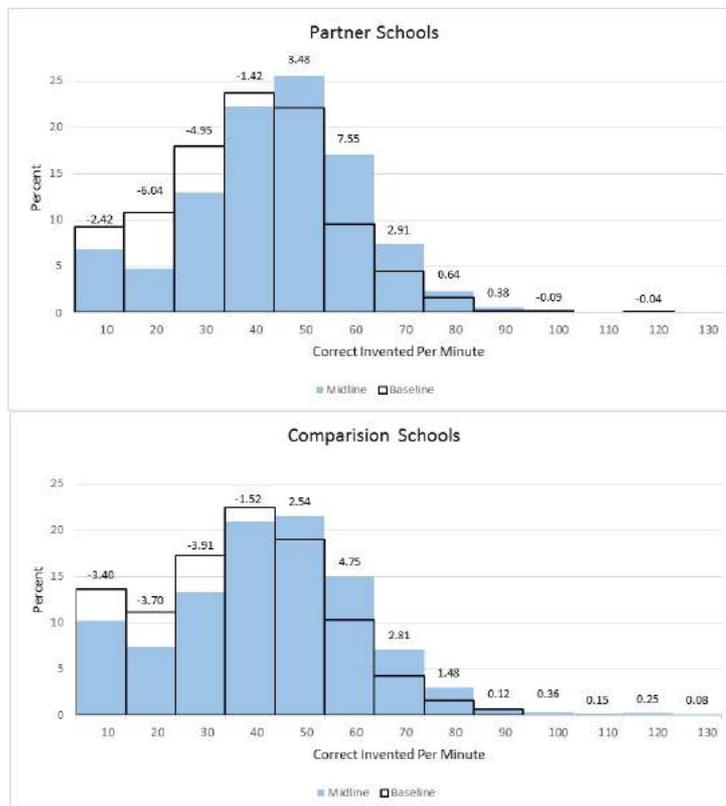


A student at a primary school in West Java, reading invented words (subtask 3).

The results summarized in Figure 5 show that students' skills in reading invented words is not as strong as reading individual familiar words, and this is understandable. However, the distribution of student scores is shifting upward and to the right side of the graph, showing increases in the students' performance from the baseline measurement, both in partner and in comparison schools. Of the grade 3 students assessed, the percentage of students that could read 40 or more invented words per minute increased from 38.3% at baseline to 53.2% at midline in partner schools and from 35.7% at baseline to 48.2% at midline in comparison schools.

This increase in students' able to identify 40 or more WPM of +14.4% in partner schools and +12.1% in comparison schools is directly reflected in the decrease in the number of students able to identify less than 40 WPM. At midline, 46.8% of partner school students and 51.8% of comparison school students were able to identify less than 40 WPM, a decrease of 15.0% and 12.5%, respectively.

Figure 5: Distribution of Sample Scores for Invented Words



3.2.4 Oral Reading Fluency

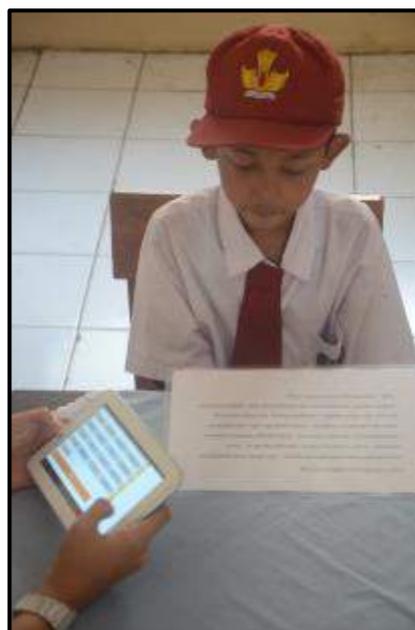
While the previous subtasks were designed to measure foundational reading skills, oral reading fluency (ORF) measures a child's ability to read connected text. In this subtask, children were asked to read within one minute a 58-word passage at baseline and a 57-word passage of local relevance at midline. The score resulted from the number of words in the passage that the student accurately read in one minute.

Interpretation of the words-per-minute results should be language specific. The phenomenon is consistent across languages that word identification becomes more accurate and automatic (i.e., faster) as reading skills develop. However, because of the differences

between languages (e.g., transparency, word length) comparisons of words per minute across languages should be interpreted with caution. For example, a guiding number for oral English reading fluency at the end of grade 2 is 60.¹¹ The students from the sampled schools were assessed at the **beginning** of grade 3 in Bahasa Indonesia.

While there is not a distributional shift toward higher oral reading scores, Figure 6 clearly shows a distributional change, with more students reading between 60 and 110 WPM at midline, both in sampled partner and in comparison schools. This shift is more noticeable among partner school students, where 65.8% of students read between 60 and 110 WPM, an increase of +9.3%; in comparison schools, 55.5% students read between 60 and 110 WPM at midline, an increase of +5.1%.

Despite these improvements, the percentage of students not able to read any of the passage slightly increased at midline in both sampled groups (+0.6% for partner schools and +0.5% for comparison schools; see also Section 3.1.1 Table 9: This result is potentially because of using a slightly more difficult reading passage at midline. While midline scores were equated to be comparable to the baseline assessment, students with zero scores were assigned a zero score during equating (see Section 2.1.1). Thus, with a more difficult reading passage, it is expected that more students would not be able to read from the connected passage. However, when looking beyond a single value of zero to a range capturing slow and non-readers (0–25 WPM), both sampled groups had fewer students falling into these classifications at midline (-0.5% for partner schools and -1.8% for comparison schools).

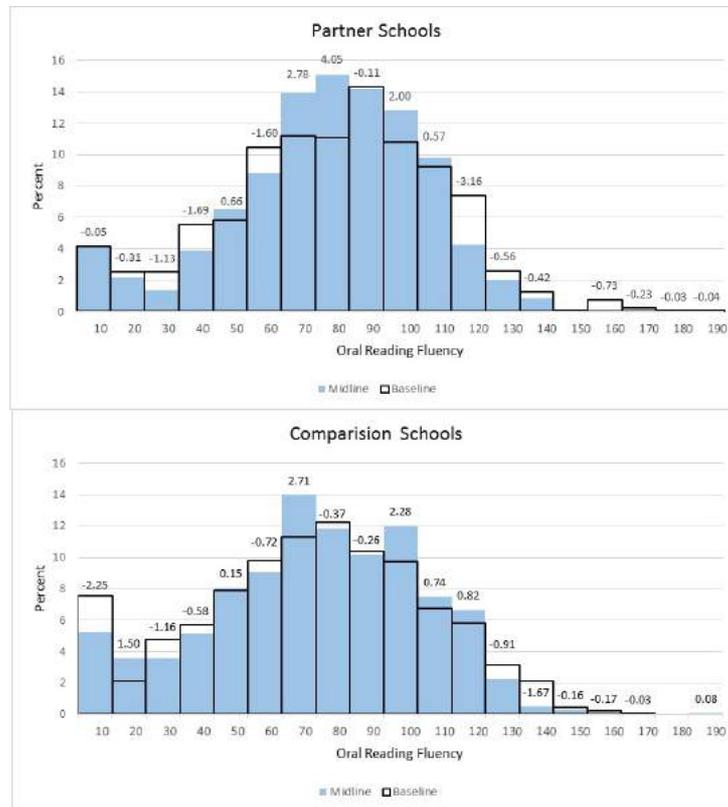


A student in SDN Kademangan 1, Banten, reading a passage during EGRA assessment.

¹¹ Abadzi, H. 2010. *Reading Fluency Measurements in EFA FTI Partner Countries: Outcomes and Improvement Prospects*. Washington, D.C.: World Bank. Available at <http://www.globalpartnership.org/media/cop%20meeting/resources/working-papers/Reading%20Fluency%20Measurements%20in%20EFA%20FTI%20Partner%20Countries-%20Outcomes%20and%20Improvement%20Prospects.%20%20Helen%20Abadzi.pdf> (accessed on May 16, 2013).

The observed midline average rates for each sampled group surpass the recommended 60 correct words per minute required for adequate comprehension.¹² When word recognition is automatic and seemingly effortless, it frees cognitive attention for comprehension.

Figure 6: Distribution of Sample Scores for Oral Reading Fluency



3.2.5 Reading Comprehension



A student at SDN 2 Lembah Sabil, Aceh Barat Day, responds to questions from an assessor (subtask 4a).

On completing the oral reading fluency subtask, students were asked five questions as a measure of comprehension of what they had read. The questions were read aloud by the assessor, and students answered verbally. At baseline, three of the questions were literal, requiring students to recall information from the story, and two questions were inferential, requiring students to combine information from the story with their background knowledge to derive a correct answer.

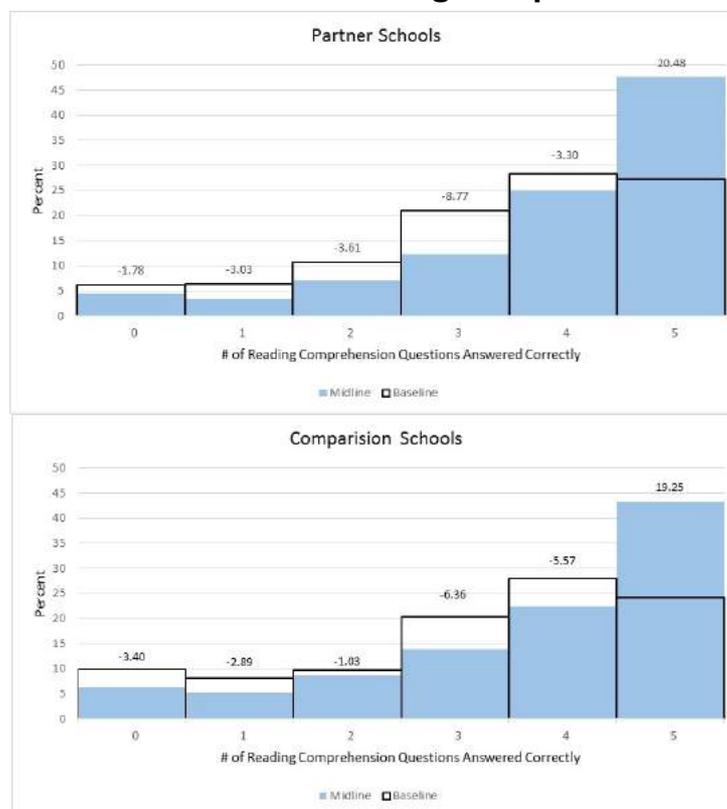
The number of literal and inferential questions at midline was the same as at baseline, three literal and two inferential questions. Students were asked comprehension questions

¹² Ibid.

corresponding only to the text he or she had attempted. Thus, the number of questions attempted was dependent on how many words the child had read in the text. As a result, for this subtask, the sample size is different for each of the five questions. Children’s reading comprehension scores are reported in the number of correct responses to the five questions.

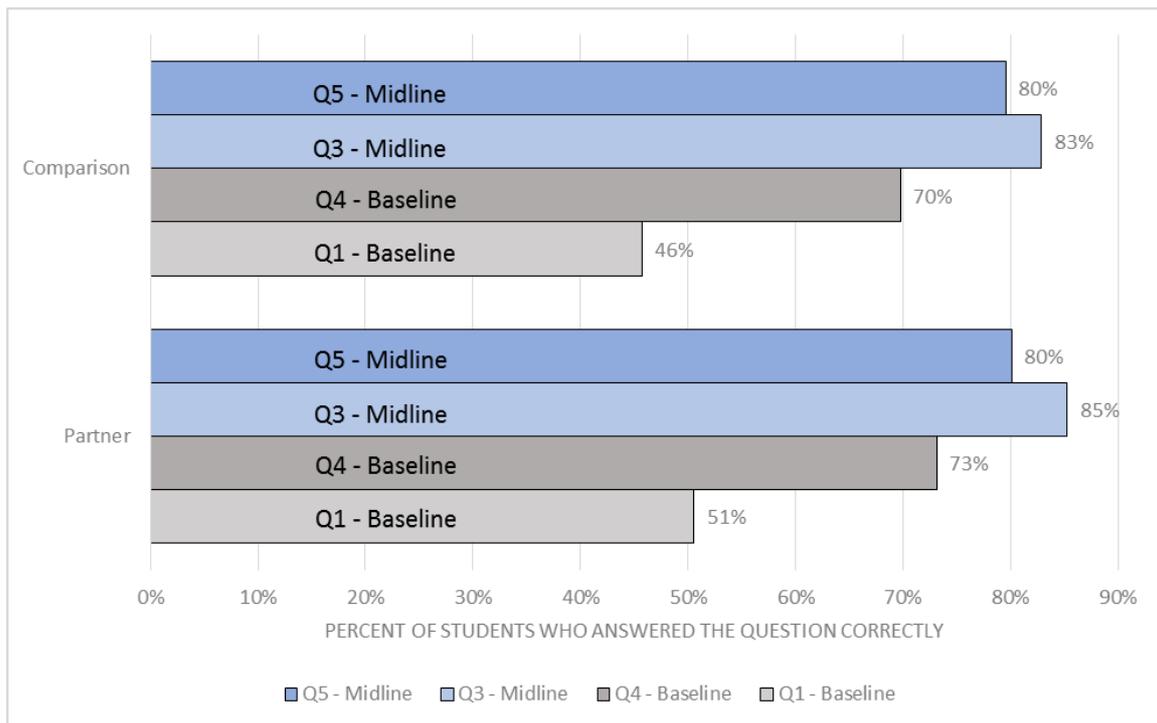
Overall, children in the sampled schools correctly scored, on average, 3.2 out of 5 for comparison schools at baseline and 3.7 out of 5 for comparison schools at midline. Partner schools scored 3.4 out of 5 at baseline and a mean score of 3.9 at midline. Clearly, both sampled groups were scoring higher at the midline. Figure 7 illustrates the distributional shift from baseline to midline for each sampled group. There is a shift toward more students being able to answer all five questions correctly, as supported by an increase of roughly 20% of students answering all 5 questions correctly at midline compared to baseline, regardless of sampled group.

Figure 7: Distribution of Reading Comprehension Scores



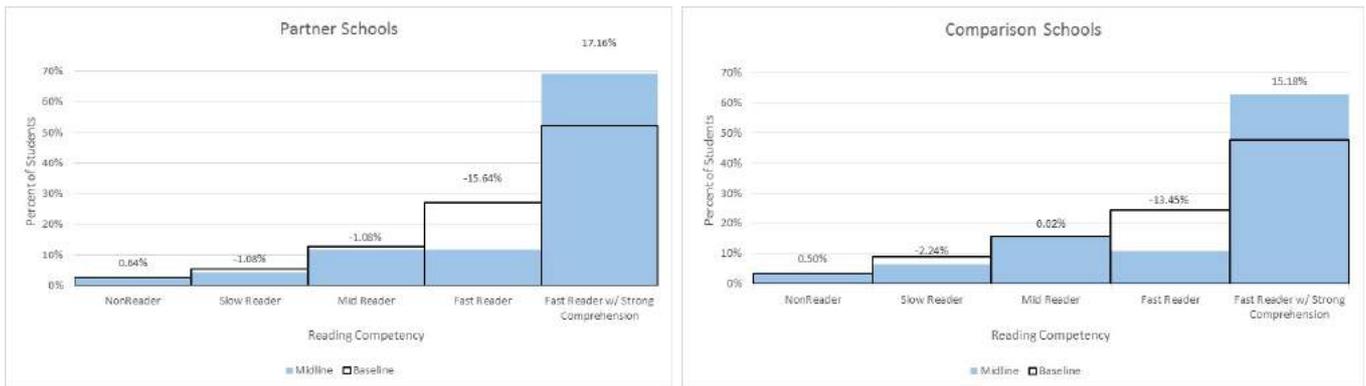
This trend is further supported by student performance on the inferential reading comprehension questions. The baseline and midline assessments each contained two inferential questions. At baseline, performance on inferential questions was mixed, with around 50% and 70% of students correctly answering inferential questions 1 and 4, respectively. Results at midline were similar on both inferential questions 3 and 5, with at least 80% of students able to answer the inferential questions correctly, regardless of sampled group. These results are detailed in Figure 8.

Figure 8: Reading Comprehension Inferential Question Analysis



Given the observed trends in similar oral reading performance and increased reading comprehension over the past two years, a further distribution was examined that combines the speed at which a student reads with their level of comprehension. This categorization was adopted from the 2014 National EGRA and Snapshot of School Management Effectiveness Survey report of findings. A stark change from baseline to midline was observed in the percentage of students able to read at least 51 WPM and answer 80% or more of the reading comprehension questions correctly; this is classified as the “fast readers with strong comprehension” category in Figure 9. In partner schools, students able to read at least 51 WPM *without* strong comprehension dropped by -15.6%, and students able to read at least 51 WPM *with* strong comprehension increased by +17.2% from baseline to midline. While slightly smaller, comparison schools demonstrated a similar trend, with a difference from baseline to midline of -13.5% for fast readers *without* strong comprehension and +15.2% for fast readers *with* strong comprehension. This further supports the hypothesis that many Indonesian students in sampled schools were reading at grade 3 proficiency at baseline, and over the past two years, teacher training has developed students’ ability to comprehend text as well as read proficiently.

Figure 9: Reading Comprehension and Reading Speeds over Time



3.2.6 Listening Comprehension

The listening comprehension subtask assessed students' comprehension of verbally presented information. Children listened to a short story read by the assessor. They were then asked three questions about the story and were required to respond. The questions included two literal questions, which could be answered by information stated directly in the story, and one inferential question, which required connecting information in the story to outside knowledge or information. Scores from the listening comprehension subtask can be used to determine whether poor reading comprehension can be attributed to poor reading or to poor language comprehension skills in general.

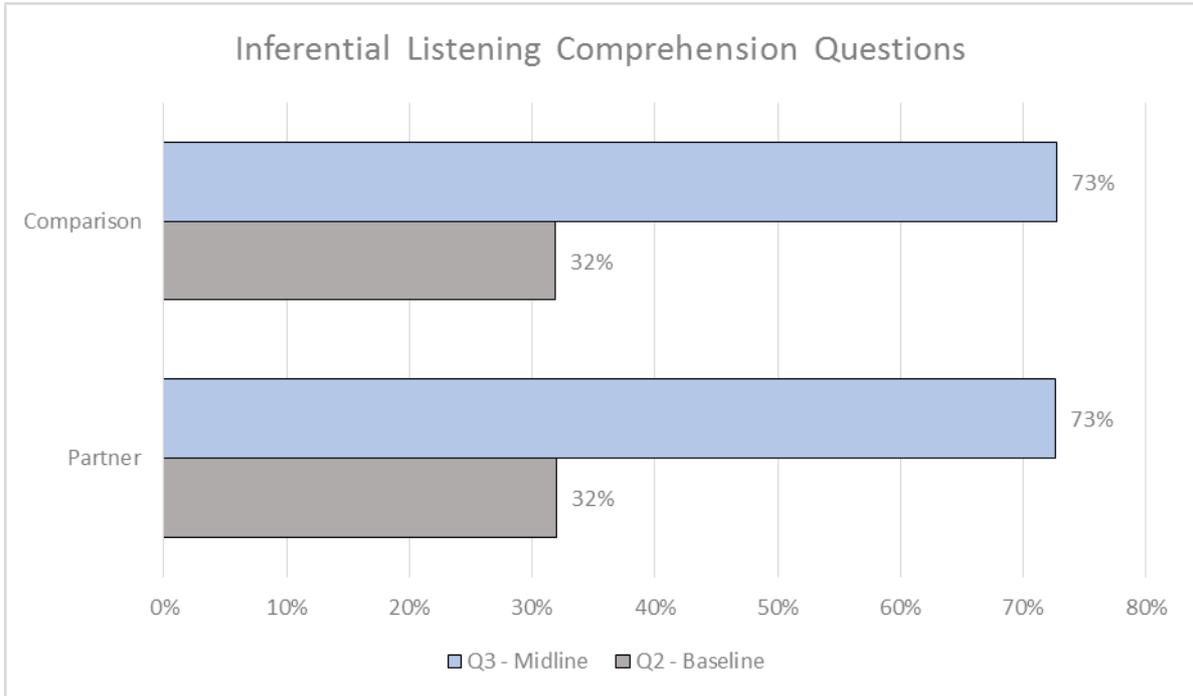


A student at SDN West Java being assessed in listening comprehension.

On average, by midline, children in the sampled partner schools correctly answered 2.6 questions for the listening comprehension subtask, as did students in comparison schools; an increase of roughly 1.0 question, on average, in each sampled group (see Table 8, above). Also revealed by their scores in reading comprehension, children appeared to comprehend the listening passage better at midline compared to baseline.

At baseline, at most 32% of students sampled were able to answer the inferential question. At midline, in both sampled groups, at least 73% of sampled students were able to answer the inferential question correctly. This trend is detailed in Figure 10.

Figure 10: Percentage of Children Correctly Answering Listening Comprehension Questions



In partner schools, the percentage of students able to answer all three listening comprehension questions correctly increased from baseline to midline by +48.8%. At baseline, the majority of students (58.2%) were able to answer at least two of the three questions correctly; at midline, the majority of students (65.2%) answered all three questions correctly. Comparison schools followed a similar trend, with 53.8% of students at baseline able to answer at least two of the three questions correctly, and 64.9% of students at midline able to answer all three questions correctly.

3.3 Indicators of Reading Achievement

Many factors influence a student’s literacy skills. While a child’s EGRA subtask scores are shaped by school instruction, there are factors outside of school that can influence a child’s development. These could be experiences prior to grade school (e.g., attending pre-school) or current environmental factors (e.g., parental support).

The identification of factors that influence student academic performance has guided educational and social policy in many countries. Policies such as these could be implemented in schools, for example, in the form of teacher training or resource allocation. Alternatively, these policies could support families by subsidizing pre-school fees.

To help identify these factors, EGRA assessors asked each student a series of questions about demographics that have been identified previously as influential in affecting student academic performance. This section discusses the relationship between EGRA subtasks and these self-reported demographic factors.

3.3.1 Regression Analysis of Demographic Indicators of Reading Achievement



A student at MIN Tanjung Mulia, Langkat, North Sumatra, during the assessment.

To explore the effect of the USAID PRIORITAS intervention over time, or the treatment-by-time effect, four linear regression models were fit to model the mean subtask scores on (1) letter name knowledge, (2) familiar word reading, (3) invented word decoding, and (4) oral reading fluency. The coefficients for each model are presented in Table 12, with the modeled variable in the first row. The coefficients in the last

four columns of the table are interpreted in Section 3.3.2 below.

Table 12 presents the results of regression models that were used to examine the conditional impact of each of the demographic indicators of reading achievement on mean subtask scores. The coefficients in the four subtask columns of the table can be interpreted as the impact of a given demographic variable on the subtask (letter name knowledge, familiar word reading, invented word decoding, and oral reading fluency), controlling for all other factors in the table. For example, the first row of results demonstrates that when location, school faith, school type, region, age, sampled group, and intervention phase are constant, the impact of being female increases the average oral reading fluency scores by an average of +7.9 words per minute above that of a male student with the same values for all other variables.

Table 12: Regression Analysis Model Details

Demographic Category	Indicator	Letter Name Knowledge	Familiar Word Reading	Invented Word Decoding	Oral Reading Fluency
Gender	Male (Ref)	-	-	-	-
	Female	2.54**	4.36**	3.43**	7.92**
School Location	Rural (Ref)	-	-	-	-
	Urban	2.98**	8.14**	5.55**	10.54**
School Faith	Religious (Ref)	-	-	-	-
	Secular	-	3.44**	2.47**	5.19**
School Type	Public (Ref)	-	-	-	-
	Private	-	-	2.3*	2.96
Region	Aceh (Ref)	-	-	-	-
	Banten	17.26**	20.08**	12.44**	20.55**
	West Java	17.77**	21.66**	14.04**	21.33**
	Central Java	26.33**	21.85**	12.58**	23.35**
	East Java	18.7**	25.05**	17.15**	31.52**
	South Sulawesi	9.05**	4.79**	2.85**	12.34**
	North Sumatra	10.98**	13.71**	5.68**	-

Demographic Category	Indicator	Letter Name Knowledge	Familiar Word Reading	Invented Word Decoding	Oral Reading Fluency
Age	7 years old (Ref)	-	-	-	-
	8 years old	6.57**	-	-	-
	9 years old	5.04**	-3.57**	-2.15**	-4.27**
	10+ years old	-	-14.81**	-9.58**	-16.76**
Treatment Group	Comparison (Ref)	-	-	-	-
	Partner	1.23	2.26	0.47	2.76*
Treatment Phase	Baseline (Ref)	-	-	-	-
	Midline	1.42	0.35	4.69**	-1.56
Treatment Group x Treatment Phase	Comparison at Baseline (Ref)	-	-	-	-
	Comparison at Midline (Ref)	-	-	-	-
	Partner at Baseline (Ref)	-	-	-	-
	Partner at Midline	0.00	0.95	0.79	0.32
Intercept (Constant)		62.89	45.38	19.78	45.75
Home Language	Other	-	-	-	-
	Indonesian	4.06**	7.51**	4.33**	8.87**
Have Books at Home	No	-	-	-	-
	Yes	3.2**	3.98**	2.78**	5.2**
Parents Read to Child	No	-	-	-	-
	Yes	-2.53**	-5.1**	-2.76**	-5.84**
Attended Pre-school	No	-	-	-	-
	Yes	9.58**	13.87**	7.63**	15.39**

* p<0.001, ** p < 0.0001

Ref = point of reference SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Given the potential for confounding factors, the student sample, these regression models provide a way to measure the effect of the intervention over time, when other variables that affect student performance (such as school location) are held constant. It appears students that belong to partner schools score on average between +0.5 and +2.8 letters/words per minute, depending on the skill, above comparison school students when demographic features are controlled; this difference was significant for oral reading fluency. The models also indicate that students at midline scored, on average, between -1.6 and +4.7 letters/words per minute, depending on the skill, above students at baseline. This difference was significant for invented word decoding. Despite these main effect differences between sampled group and time, the interaction of these two covariates results in average differences of less than a one letter/word per minute increase; none of these terms were significant. This provides little evidence of an intervention-by-time effect, based on the sampled students at baseline and midline, when other factors are controlled. This does not indicate an absence of an increase due to the intervention; rather, it is difficult to conclude how much the intervention has contributed to the increase observed in student scores because over 50% of the comparison schools also received some form of training.

The effect of the intervention and time, as predicted by the regression model in Table 12, is explored in Table 13 below. When controlling for the other factors, the regression models

show that partner school students performed better, on average, at midline compared to baseline, with the exception of oral reading fluency. They also averaged better scores in all subtasks compared to students in comparison schools. At midline, a student in a partner school should expect to read on average between +1.2 and +3.2 letters/words per minute more on all modeled subtasks compared to a student in a comparison school, when controlling for other factors. As seen in the overall analysis, oral reading fluency performance decreased on average from baseline to midline. This decrease was more pronounced for comparison school students, who read on average -1.6 WPM slower at midline; partner school students read on average -1.2 WPM slower at midline ($1.52 - 2.76 = -1.24$). The decrease in student reading speeds at midline may be because students are slowing down when they read to pay more attention to meaning, as shown by increased reading comprehension scores, as discussed in Section 3.2.5.

Table 13: Effect of Intervention and Time on Subtask Scores

Intervention Phase	Sampled Group	Letter Name Knowledge	Familiar Word Reading	Invented Word Decoding	Oral Reading Fluency
Baseline	Comparison	-	-	-	-
	Partner	1.23	2.26	0.47	2.76
Midline	Comparison	1.42	0.35	4.69	-1.56
	Partner	2.64	3.56	5.95	1.52

When controlling for the other variables, the regression models show that gender, province, school location, age, speaking Bahasa Indonesia at home, having books at home, parents reading to children at home, and attending pre-school are all strongly associated with a measurable impact on average student scores in all four subtask models. For this study, individual models were fit for each exit interview question to accurately estimate the effect that speaking Bahasa Indonesia at home, having books at home, parents reading to children at home, and attending pre-school had on student performance. Attending pre-school had the most notable effect on a child’s reading performance. A student that attended pre-school can expect an average increase in oral reading fluency of +15.4 WPM above a student that did not attend pre-school, when other factors are controlled. With the exception of gender and province, which are detailed in sections above, the strongly associated variables for all four subtasks are further explored in the following section.

One unusual observation from the regression models is the negative coefficients for the parents reading to children indicator. In other words, students’ WPM scores decrease when parents read to their children at home. Similar trends have been observed in every evaluation of the USAID PRIORITAS cohorts. This is typically not the case, but it could be due to parents investing more time in children who struggle with reading, while they allow more independence for those children who are already capable of reading.

School type and school faith were not subject to further analysis, as they were not strongly associated with average student scores on *all* four subtasks modeled. However, it is worth discussing the effect of school faith and school type on student performance in Cohort 2

because slightly different trends emerged from those observed in the Cohort 1 midline analysis.

Students in public and private schools performed similarly on letter name knowledge and familiar word identification; for this reason, this trait was removed from those regression models. In the more difficult tasks of invented word decoding and oral reading fluency, school type made a difference at the 0.05 significance level and thus remained in those regression models. In invented word decoding, students in private schools, on average, scored +2.3 WPM above students in public schools. In oral reading fluency, private school students read on average +3.0 WPM faster than students in public schools. This is somewhat counterintuitive because some private schools in the sample were private madrasah schools, some of which tend to be under-resourced and may have teachers with lower qualifications.

To best understand this unexpected result for private schools, it is necessary to also consider the school faith characteristic. Students in secular and religious schools performed similarly on letter name knowledge. On all other subtasks, students in secular schools significantly outperformed sampled students in religious schools. For familiar word identification, attending secular schools yields an average increase of +3.4 WPM above students that attend religious schools; this increase is +2.5 WPM for invented word decoding and +5.2 WPM for oral reading fluency.

When both of these traits (school type and school faith) are combined, it becomes evident that students in public religious schools perform the poorest on familiar word identification, invented word decoding, and oral reading fluency, when other demographic factors are controlled. Students in private secular schools perform the best on these three subtasks, with the largest average increase observed for reading speeds of +8.2 WPM compared to students in public religious schools. The next highest scores on all subtasks come from students in public secular schools. These average increases are presented in Table 14.

This analysis indicates that secular schools outperform religious schools, regardless of school type, on familiar word reading, invented word decoding, and oral reading fluency. Within secular schools, private schools outperform public schools on invented word decoding and oral reading fluency.

Table 14: Effect of School Type and School Faith on Subtask Scores

School Type	School Faith	Letter Name Knowledge	Familiar Word Reading	Invented Word Decoding	Oral Reading Fluency
Public	Religious	-	-	-	-
	Secular	-	3.44	2.47	5.19
Private	Religious	-	-	2.30	2.96
	Secular	-	3.44	4.77	8.15

There were various differences between the performance of children 7, 8, 9, and 10 years of age or older on the four subtasks when controlling for the other reading indicators. Students 7 and 8 years of age identified more familiar words per minute, decoded more

invented words per minute, and read faster than students 9 or more years of age. For familiar word reading, children 10 or more years of age identified on average -14.8 familiar WPM and 9-year-old students identified on average -3.6 familiar WPM fewer than students 7 and 8 years of age. A similar trend with similar magnitude was discovered in invented word decoding and oral reading fluency. On the letter name knowledge subtask, 7-year-old students and students 10 years of age or older performed similarly to 8- and 9-year-old students, identifying on average at least +5.0 more letters per minute. As many of the older students may have been held back (not progressed to the next grade) because of underdeveloped reading skills, this could explain the large age-based discrepancy in reading scores between the students. Generally, students between the ages of 7 and 8 years performed, on average, better than their older peers when other demographic characteristics are held constant.

A student's province seemed to be the factor with the largest impact on results, which highlights the low performance of students in schools sampled in Aceh compared to the other regions when other variables are held constant. Most notably, on average, students in East Java read +31.5 words per minute faster on the oral reading fluency subtask than students in Aceh or North Sumatra. Students in North Sumatra performed similar to students in Aceh on oral reading fluency. Following East Java, students in Central Java and West Java read, on average, +23.4 and +21.3 WPM faster than students in Aceh or North Sumatra, respectively.

3.3.2 Strongly Associated Indicators

School Location (Urban and Rural)

Globally, children who live in urban areas tend to demonstrate better literacy rates than children in rural areas. This held true for the students in the study as shown in Table 15, where urban students, on average, outscore their rural counterparts in every modeled subtask by +3.0 LPM and at least +5.6 WPM. On oral reading fluency, students attending schools in urban locations read, on average, +10.5 WPM faster than students attending schools in rural locations, when demographic features are controlled. Students that attend urban schools often have access to services, such as pre-school and libraries, which are often unavailable in more rural areas.

Within school location and with respect to sampled group, students significantly improved in the invented word decoding, reading comprehension, and listening comprehension subtasks from baseline to midline. At baseline, rural partner school students significantly outperformed rural comparison school students in all subtasks. These differences remained significant at midline, with the exception of the listening comprehension subtask. At baseline and midline, urban partner and urban comparison school students performed similarly on all subtasks. These trends are detailed in Table 15.

Within schools in rural areas, students in sampled partner schools revealed an impressive increase in reading comprehension, both over time and against students in sampled comparison schools. At midline, 67.7% of students in rural partner schools were able to correctly answer 80% or more of reading comprehension questions, an increase of +19.1% from baseline. About 58.1% of students in rural comparison schools were able to

accomplish a similar standard, an increase of +12.5% from baseline. For rural schools, the rate of improvement in the percentage of students able to achieve at least 80% reading comprehension between partner and comparison schools was significant, with a medium effect size. In other words, the rate of improvement in partner schools was significantly larger than the rate of improvement in comparison schools.

Table 15: Subtasks by School Location

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Rural						
Letter Name Knowledge (CLPM)	Comparison	81.28 (0.52)	82.02 (0.49)	0.87	0.42	0.03
	Partner	84.84 (0.56) ⁺⁺	86.46 (0.57) ⁺⁺			
Familiar Word Reading (CWPM)	Comparison	60.37 (0.59)	60.87 (0.6)	2.38	0.07	0.07
	Partner	64.35 (0.69) ⁺⁺	67.24 (0.69) ⁺⁺			
Invented Word Decoding (CIWPM)	Comparison	29.81 (0.34)	33.8 (0.39) ^{**}	1.34	0.09	0.07
	Partner	32.11 (0.42) ⁺⁺	37.43 (0.45) ^{++ **}			
Oral Reading Fluency (ORF)	Comparison	63.24 (0.6)	61.73 (0.61)	2.24	0.09	0.06
	Partner	67.86 (0.73) ⁺⁺	68.58 (0.68) ⁺⁺			
Reading Comprehension (5)	Comparison	2.98 (0.03)	3.44 (0.03) ^{**}	0.1	0.15	0.06
	Partner	3.16 (0.04) ⁺	3.72 (0.03) ^{++ **}			
Listening Comprehension (3)	Comparison	1.36 (0.02)	2.48 (0.02) ^{**}	-0.08	0.04	-0.09
	Partner	1.48 (0.02) ⁺	2.52 (0.02) ^{**}			
80% or Better on Reading Comprehension	Comparison	45.64% (1.15)	58.14% (1.08) ^{**}	0.07	< 0.01	0.12
	Partner	48.59% (1.27)	67.7% (1.19) ^{++ **}			
Urban						
Letter Name Knowledge (CLPM)	Comparison	87.48 (0.74)	90.1 (0.93)	-1.16	0.44	-0.06
	Partner	86.2 (0.66)	87.66 (0.63)			
Familiar Word Reading (CWPM)	Comparison	71.98 (0.85)	73.54 (1)	-0.9	0.6	-0.04
	Partner	72.36 (0.8)	73.02 (0.75)			
Invented Word Decoding (CIWPM)	Comparison	38.02 (0.59)	44.36 (0.77) ^{**}	-0.61	0.61	-0.04
	Partner	36.45 (0.49)	42.18 (0.51) ^{**}			
Oral Reading Fluency (ORF)	Comparison	78.6 (0.93)	78.62 (1.02)	-2.08	0.26	-0.07
	Partner	78.63 (0.87)	76.57 (0.84)			
Reading Comprehension (5)	Comparison	3.54 (0.05)	4 (0.04) ^{**}	0.06	0.47	0.05
	Partner	3.55 (0.04)	4.07 (0.04) ^{**}			
Listening Comprehension (3)	Comparison	1.71 (0.03)	2.63 (0.02) ^{**}	-0.02	0.74	-0.02
	Partner	1.67 (0.03)	2.58 (0.02) ^{**}			
80% or Better on Reading Comprehension	Comparison	61.54% (1.59)	74.24% (1.55) ^{**}	0.04	0.21	0.09
	Partner	59.52% (1.55)	75.96% (1.31) ^{**}			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Language Used at Home

If a student speaks a language at home that is different from the instructional language used in the classroom (in most cases, Bahasa Indonesia), that student had significantly lower literacy skills, on average at baseline, compared to students who speak the same language at home as the instructional language (Bahasa Indonesia) used in the classroom. This fact was supported by the regression model for language used at home (see Table 12), where speaking Bahasa Indonesia at home increases a student’s average letter identification by +4.1 LPM, familiar word reading by +7.5 WPM, invented word decoding by +4.3 WPM, and oral reading fluency by +8.9 WPM. Student performance on each subtask, with respect to language used at home, are presented in Table 16. Among students who spoke Bahasa Indonesia (the instructional language) at home and school, the partner school students did not demonstrate stronger reading abilities than those in comparison schools at baseline, with the exception of oral reading fluency. By midline, significant differences were detected between partner and comparison school students who speak Indonesian at home for the familiar word reading and reading comprehension subtasks. At midline, partner school students who speak Bahasa Indonesia at home read +4.3 familiar WPM and correctly answered +0.2 reading comprehension questions more than similar comparison school students. Within sampled group, both partner and comparison school students significantly improved in the invented word decoding, reading comprehension, and listening comprehension subtasks. While not significant, effect sizes for many subtasks indicate that partner school students improved at a better rate than comparison school students.

Among students who spoke a different language at home, significant differences between partner school students and comparison school students at baseline were no longer present at midline. This is further supported by negative effect sizes for all subtasks. By midline, comparison sample students performed similarly to partner sample students, even though on average, they had been significantly different at baseline for students who did not speak Indonesian at home. Perhaps this occurred because of the strong performance at baseline among students in partner schools, which left these students a limited amount of room for improvement to increase already high scores. Overall, students at partner schools generally did score better at midline, regardless if they spoke Indonesian or another language at home.

Table 16: Subtasks by Language Used at Home

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Indonesian						
Letter Name Knowledge (CLPM)	Comparison	86.49 (0.64)	87.02 (0.78)	2.76	0.04	0.13
	Partner	85.89 (0.68)	89.18 (0.54) *			
Familiar Word Reading (CWPM)	Comparison	69.25 (0.78)	70.12 (0.85)	1.87	0.23	0.07
	Partner	71.72 (0.85)	74.46 (0.64)**			
Invented Word Decoding (CIWPM)	Comparison	35.34 (0.49)	40.8 (0.65)**	1.12	0.29	0.07
	Partner	35.89 (0.51)	42.46 (0.43) **			
Oral Reading Fluency (ORF)	Comparison	73.36 (0.85)	73.82 (0.86)	-1.07	0.52	-0.04
	Partner	77.7 (0.92)+	77.09 (0.69)			

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Reading Comprehension (5)	Comparison	3.41 (0.04)	3.87 (0.04)**	0.1	0.21	0.07
	Partner	3.55 (0.04)	4.11 (0.03)** **			
Listening Comprehension (3)	Comparison	1.59 (0.03)	2.6 (0.02)**	-0.12	0.01	-0.16
	Partner	1.71 (0.03)	2.6 (0.02) **			
80% or Better on Reading Comprehension	Comparison	56.86% (1.46)	71.19% (1.37)**	0.01	0.78	0.02
	Partner	61.32% (1.56)	76.42% (1.13) **			
Other Home Language						
Letter Name Knowledge (CLPM)	Comparison	80.67 (0.66)	84.12 (0.59)*	-5.48	< 0.0001	-0.2
	Partner	85.47 (0.68)**	83.44 (0.86)			
Familiar Word Reading (CWPM)	Comparison	60.24 (0.83)	62.14 (0.79)	-4.48	0.01	-0.14
	Partner	66.43 (0.8)**	63.85 (0.94)			
Invented Word Decoding (CIWPM)	Comparison	30.57 (0.52)	35.87 (0.52)**	-2.47	0.02	-0.12
	Partner	33.52 (0.48)**	36.35 (0.62)			
Oral Reading Fluency (ORF)	Comparison	64.93 (0.91)	63.76 (0.85)	-2.9	0.13	-0.08
	Partner	70.75 (0.91)**	66.68 (1.11)			
Reading Comprehension (5)	Comparison	2.97 (0.04)	3.47 (0.04)**	-0.1	0.28	-0.06
	Partner	3.2 (0.04)+	3.6 (0.06) **			
Listening Comprehension (3)	Comparison	1.41 (0.03)	2.49 (0.02)**	-0.08	0.12	-0.08
	Partner	1.46 (0.03)	2.46 (0.03) **			
80% or Better on Reading Comprehension	Comparison	46.54% (1.26)	57.89% (1.27)**	0.07	0.02	0.13
	Partner	47.74% (1.5)	65.88% (1.62)+ **			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group
+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time
SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Access to Books at Home

Access to books at home offers children early familiarity and practice that benefit literacy skills. A large body of research indicates that books at home offer the potential for an early start in building foundational skills and vocabulary and in hearing models of fluent reading. These skills help children to learn that reading has multiple purposes beyond academics. This was supported by the regression model for access to books at home (see Table 12), where having access to books at home increases a student's average



Children get more access to books through the mobile book cart service.

letter identification by +3.2 LPM, familiar word reading by +4.0 WPM, invented word decoding by +2.8 WPM, and oral reading fluency by +5.2 WPM. Student performance on each subtask when having access to books at home is presented in Table 17.

Within the access to books at home classification, partner school students scored higher on all subtasks compared to comparison school students. Both partner and comparison students significantly improved in the invented word decoding, reading comprehension, and listening comprehension subtasks from baseline, regardless of sampled group. Partner school students with access to books at home scored significantly higher on reading comprehension compared to comparison students with access to books at home. For reading fluency within the group with access to books, partner school students read on average 74.9 WPM at midline; comparison school students read on average 72.4 WPM at midline. In addition, approximately 75% of students in partner schools achieved reading comprehension scores of 80% or better at midline—an increase of +13.2%.

Among students without access to books at home, performance results showed similar trends as those among students with access to books at home. At baseline, students in sampled partner schools performed noticeably better than students in sampled comparison schools on familiar word reading, invented word decoding, oral reading fluency, and listening comprehension subtasks. By midline, partner school students continued to score significantly higher than comparison school students in familiar word reading and oral reading fluency. Students in partner schools without access to books at home read +5.2 WPM faster than students in the comparison group without materials at home.

Partner school students that have access to books at home and comparison school students that have access to books at home increased at similar rates on all subtasks from baseline to midline. A possible reason behind this trend is that students with access to books typically come from wealthier families. Due to the socioeconomic impact, these families with more resources will invest more time in their children using the books. Thus, regardless of whether or not the student was in a partner or comparison school, the socioeconomic factor may be impacting the effect of having access to books may have an impact on reading skills. In addition, this difference in rate of improvement is most likely due to the lower baseline scores of students without access to books at home; these students likely had more room for improvement than their counterparts, who had access to books at home.

Table 17: Subtasks by Access to Books at Home

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Access to Books at Home						
Letter Name Knowledge (CLPM)	Comparison	85.84 (0.63)	87.35 (0.72)	-0.72	0.59	-0.03
	Partner	87.48 (0.67)	88.27 (0.59)			
Familiar Word Reading (CWPM)	Comparison	67.98 (0.78)	68.57 (0.84)	-0.93	0.56	-0.03
	Partner	72.16 (0.84) ⁺	71.82 (0.71)			
Invented Word Decoding (CIWPM)	Comparison	35.13 (0.5)	40.49 (0.64) ^{**}	-0.52	0.63	-0.03
	Partner	36.43 (0.52)	41.28 (0.5) ^{**}			
Oral Reading Fluency (ORF)	Comparison	73.17 (0.84)	72.36 (0.88)	-2.79	0.11	-0.09
	Partner	78.49 (0.94) ⁺⁺	74.89 (0.8)			
Reading Comprehension (5)	Comparison	3.34 (0.04)	3.79 (0.04) ^{**}	-0.02	0.83	-0.01
	Partner	3.57 (0.04) ⁺⁺	4.01 (0.04) ^{++ **}			
Listening Comprehension (3)	Comparison	1.58 (0.03)	2.57 (0.02) ^{**}	0	0.93	-0.01
	Partner	1.62 (0.03)	2.61 (0.02) ^{**}			
80% or Better on Reading Comprehension	Comparison	55.88% (1.34)	68.79% (1.26) ^{**}	0	0.9	0.01
	Partner	61.61% (1.52)	74.85% (1.23) ^{+ **}			
No Access to Books at Home						
Letter Name Knowledge (CLPM)	Comparison	81.04 (0.7)	83.75 (0.67)	-0.66	0.64	-0.03
	Partner	83.43 (0.69)	85.48 (0.77)			
Familiar Word Reading (CWPM)	Comparison	61.18 (0.89)	64.49 (0.87)	-0.19	0.92	-0.01
	Partner	66.03 (0.85) ⁺⁺	69.16 (0.92) ⁺			
Invented Word Decoding (CIWPM)	Comparison	30.47 (0.5)	36.44 (0.57) ^{**}	0	1	0
	Partner	32.89 (0.48) ⁺	38.87 (0.57) ^{**}			
Oral Reading Fluency (ORF)	Comparison	64.47 (0.97)	66.06 (0.98)	-0.27	0.89	-0.01
	Partner	69.95 (0.89) ⁺⁺	71.27 (0.99) ⁺			
Reading Comprehension (5)	Comparison	3.04 (0.05)	3.59 (0.04) ^{**}	0.06	0.48	0.04
	Partner	3.2 (0.04)	3.81 (0.05) ^{+ **}			
Listening Comprehension (3)	Comparison	1.4 (0.03)	2.53 (0.02) ^{**}	-0.24	< 0.0001	-0.27
	Partner	1.58 (0.03) ⁺⁺	2.47 (0.03) ^{**}			
80% or Better on Reading Comprehension	Comparison	46.98% (1.48)	61.55% (1.56) ^{**}	0.07	0.02	0.14
	Partner	47.81% (1.63)	69.47% (1.47) ^{+ **}			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

Pre-school Education

Pre-school plays an important role in developing early literacy, numeracy, and social skills and thus helps prepare students for success in primary school. This was supported by the regression model for pre-school education (see Table 12), where attending pre-school increases a student’s average letter identification by +9.6 LPM, familiar word reading by +13.9 WPM, invented word decoding by +7.6 WPM, and oral reading fluency by +15.4

WPM. Student performance on each subtask with respect to pre-school education experience is presented in Table 18.

Of the students in the sampled schools at baseline and midline, 13.9% reported that they had not attended pre-school. More significant is that almost twice as many students in rural schools did not attend pre-school (19.3%), compared to students at urban schools (9.1%).

Among students who had attended pre-school, the sampled partner school students performed better at baseline on all six subtasks than the comparison school students. Although both sampled groups demonstrated noticeable increases in scores from baseline to midline, students in sampled partner schools continued to outperform students in sampled comparison schools at midline. These differences were significant for familiar word reading and reading comprehension. However, no significant DID effects were identified for students with a pre-school education.

Results were more promising among students who had not attended pre-school. As with students that had attended a pre-school, partner school students continued to outperform comparison school students at midline. While none of these differences were significant at baseline, it was at midline that partner school students scored significantly better on familiar word reading and invented word decoding skills compared to comparison school students. Both partner and comparison school students without a pre-school education significantly increased in listening comprehension from baseline to midline. However, only partner school students also significantly increased in invented word decoding and reading comprehension. While none of the DID effects were significant, DID effects for every subtask, except listening comprehension, indicate partner school students improved at a faster rate than comparison school students without access to a pre-school education. From these results, it appears that the USAID PRIORITAS intervention is having more of an impact among students who do not attend pre-school.

Table 18: Subtasks by Pre-school Education

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
Pre-school Education						
Letter Name Knowledge (CLPM)	Comparison	85.97 (0.49)	87.4 (0.57)	-0.78	0.44	-0.03
	Partner	87.2 (0.51)	87.84 (0.46)			
Familiar Word Reading (CWPM)	Comparison	68.16 (0.57)	69.02 (0.62)	-0.82	0.49	-0.03
	Partner	71.88 (0.63)**	71.92 (0.55)+			
Invented Word Decoding (CIWPM)	Comparison	34.98 (0.36)	40.17 (0.46)**	-0.36	0.65	-0.02
	Partner	36.14 (0.39)	40.96 (0.38) **			
Oral Reading Fluency (ORF)	Comparison	73.1 (0.6)	72.18 (0.63)	-1.8	0.15	-0.06
	Partner	77.71 (0.68)**	74.99 (0.6)			
Reading Comprehension (5)	Comparison	3.38 (0.03)	3.83 (0.03)**	0.03	0.6	0.02
	Partner	3.53 (0.03)+	4.02 (0.03)** **			
Listening Comprehension (3)	Comparison	1.57 (0.02)	2.58 (0.01)**	-0.07	0.05	-0.09
	Partner	1.65 (0.02)	2.58 (0.01) **			

Subtask	Group	Baseline	Midline	DID	p-Value	DID Effect Size
		Mean (SE)	Mean (SE)			
80% or Better on Reading Comprehension	Comparison	56.38% (1.07)	69.26% (0.99)**	0.03	0.13	0.07
	Partner	58.95% (1.22)	75.09% (0.97)**			
No Pre-school Education						
Letter Name Knowledge (CLPM)	Comparison	73.9 (1.12)	74.74 (1.22)	3.98	0.15	0.14
	Partner	77.01 (1.33)	81.83 (1.77)			
Familiar Word Reading (CWPM)	Comparison	51.05 (1.38)	51.41 (2.07)	5.65	0.1	0.16
	Partner	55.43 (1.49)	61.45 (1.85)+			
Invented Word Decoding (CIWPM)	Comparison	24.74 (0.76)	28.91 (1.23)	3.53	0.08	0.17
	Partner	27.54 (0.82)	35.24 (1.13)+ **			
Oral Reading Fluency (ORF)	Comparison	52.92 (1.41)	52.05 (2.44)	4.44	0.23	0.12
	Partner	57.5 (1.58)	61.07 (1.79)			
Reading Comprehension (5)	Comparison	2.43 (0.07)	2.8 (0.1)	0.18	0.31	0.1
	Partner	2.66 (0.07)	3.2 (0.1) **			
Listening Comprehension (3)	Comparison	1.17 (0.04)	2.34 (0.04)**	-0.17	0.06	-0.17
	Partner	1.35 (0.04)	2.36 (0.05) **			
80% or Better on Reading Comprehension	Comparison	32.55% (1.96)	40.7% (3.15)	0.09	0.07	0.19
	Partner	35.88% (2.21)	53.53% (2.93) *			

* p<0.001, ** p<0.0001; significant differences across time groups within treatment group

+ p<0.001, ++ p<0.0001; significant differences across treatment groups within time

SE = standard error; DID = difference in differences; CLPM = correct letters per minute; CWPM = correct words per minute; CIWPM = correct invented words per minute; ORF = oral reading fluency

4 How Well Teachers Are Teaching Reading in the Early Grades

Every year, USAID PRIORITAS has repeated a qualitative assessment of how reading in early grades is taught in schools, to better understand the approaches used in the classroom as well as the reading support that students are receiving.

The second and third rounds (midline) of monitoring collected the same information from the same schools that were surveyed during the baseline collection, to assess the changes that had taken place over a one-year and two-year period.



An early grade teacher using a big book during practice teaching.

4.1 Monitoring Instruments and Protocol

The assessment of the quality of reading instruction included two instruments and a focus group discussion. The first instrument was a classroom observation of grade 1 and grade 2 teachers, for the duration of 35 minutes each.

The second instrument consisted of interview questions for the early grade teachers whose classes were observed. The interviews focused on reading time and allowing students to bring books home.

The final part of the assessment involved a focus group discussion with school principals, supervisors, school committees, and senior teachers, whose classes were not observed. The focus group discussions aimed to establish what schools were doing to promote a reading culture.

4.2 Design

Classroom observations were conducted in early grades classrooms in 160 primary schools—80 partner schools and 80 comparison schools—in 20 districts in 7 provinces across Indonesia. These were the same schools in which EGRA was administered.

Table 19 shows the number and type of respondents from primary schools, including the 320 grade 1 and grade 2 teachers who were observed, in addition to respondents participating in the focus group discussions.

Table 19: Number and Type of Respondents from Primary Schools

	Partner			Comparison		
	2013	2014	2015	2013	2014	2015
School Principals	75	73	77	73		75
Senior Teachers	10	18	57	8		55
Teachers	120	87	83	119		89
School Committee	96	114	83	95		89
Classroom Observations						
Teachers (grade 1, 2)	160	160	160	160		160
Total	461	452	460	455		468

4.3 Findings

This section presents the results of the assessment in sampled partner schools and comparison schools for three indicators, including (1) early grade classroom teaching, (2) use of early grade reading materials, and (3) school reading programs. Table 20 shows a summary of the three rounds of monitoring indicators from both the partner and comparison schools.

Table 20: Summary of the Baseline (2013), the Second Round (2014), and the Third Round (Midline 2015) of Monitoring Indicators

Indicator	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
Early grade teachers demonstrate good practice in teaching and assessing reading	15.0%	70.3%	77.6%	15.7%		35.0%
Early grade reading materials are regularly used	30.0%	64.2%	59.0%	28.9%		43.1%
Primary school managers initiate activities to create a school reading culture	46.3%	76.3%	91.3%	48.8%		53.8%

In two years, a five-fold increase was achieved in the percentage of early grade teachers in partner schools who demonstrate good practice in teaching (from 15.0% to 77.6%). During the same period, the percentage in comparison schools also increased, but to a lesser degree (from 15.7% to 35.0%).

The percentage of regular use of early grade reading materials also increased from 30.0% at baseline to 64.2% at the second round of monitoring, and it decreased to 59% at midline monitoring. Increases were also found in comparison schools, but in lower percentages.

Forty-six percent of school managers initiated activities to create a reading culture during the baseline. This percentage increased to 91% by the midline monitoring. The increase in the comparison schools was almost relatively small: only 5% (from 48.8% to 53.8%).

4.3.1 Early Grade Teachers Demonstrate Good Practice in Teaching

This indicator consists of six criteria. To demonstrate good practice, a teacher must:

1. Provide specific grade-appropriate instruction to the learner to build word knowledge and teach word analysis;¹³
2. Provide opportunities for students to engage in sustained reading activities¹⁴ to practice their reading skills;
3. Create a literacy-rich¹⁵ classroom environment;
4. Check students' comprehension of what they are reading;¹⁶
5. Read aloud to students and ask students to read aloud using a range of materials¹⁷ to enhance their print and phonological awareness; and
6. Conduct regular and purposeful monitoring of students' progress in reading.

The following is an analysis of each of the six criteria of the early grade teachers' teaching competencies.

Criterion 1: Provide specific grade-appropriate instruction to the learner to build word knowledge and teach word analysis

The criterion is measured through four specific activities: (i) show the smallest unit of a word, (ii) read the first phoneme of a word, (iii) split the word into syllables, and (iv) introduce new words.

Table 21 shows an increase of at least 50% between baseline monitoring and midline in all four activities in the partner schools. Increases in percentages also occurred in comparison schools, although not as much. In fact, a decrease in percentage was observed in one of the four activities: "splitting word into syllables."

¹³ Phonemic awareness, phonics, word recognition, structural analysis, context clues, and vocabulary.

¹⁴ This can be silent or oral reading, individual or small group reading.

¹⁵ A literacy-rich environment includes displaying words and print in and possibly outside the classroom: providing opportunities, materials, and tools that engage students in reading activities, including, for example, creating book corners to ensure students have access to a range of interesting material in different media that are appropriate to different reading and instructional levels.

¹⁶ Talks to students about what they are reading, asks them to re-tell events and details, and asks them to predict next events.

¹⁷ Including repetitive texts, rhymes, poems, and songs.

Table 21: Teacher Provides Specific Instruction to Help Learners Build Word Knowledge

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. Show the smallest unit (phoneme) of a word (Example word “malam” has phonemes “m-a-l-a-m”)	42.5%	55.4%	64.0%	42.8%		49.1%
ii. Read the first phoneme of a word. (Example: The word “malam” starts with “m”)	30.6%	54.1%	54.0%	34.0%		39.0%
iii. Split the word into syllables (Example: ma- lam)	38.1%	59.5%	67.7%	57.2%		45.9%
iv. Introduce new words; explain their meaning to increase the students’ vocabulary	41.3%	54.7%	71.4%	34.0%		48.4%

Criterion 2: Provide opportunities for students to engage in sustained reading activities to practice their reading skills

Two activities were observed to measure the criteria: (i) give opportunities to perform silent reading, and (ii) read aloud individually or in small groups. The baseline data show that the majority of teachers provide opportunities for reading aloud and very few for silent reading. During the second and third monitoring, there were increases in both activities—“opportunities to read aloud” and in “silent reading” in partner schools (Table 22).

Table 22: Teacher Provides Opportunities for Students to Engage in Sustained Reading Activities

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. Give opportunities for students to perform silent reading	18.1%	41.2%	46.6%	11.3%		23.9%
ii. Give opportunities for students to read aloud individually or in a small group (it could be texts or words in a sentence)	73.8%	87.8%	90.7%	74.2%		73.0%

Criterion 3: Create a literacy-rich classroom environment

Four activities were observed to measure the criteria: (i) display words, pictures, and print inside and (ii) display words, pictures, and print outside the classrooms; (iii) the school has reading corners in the classrooms; and (iv) the materials are appropriate for the instructional level. As shown in Table 23, significant increases of percentages had occurred in all four activities, with the percentage increase for provision of school reading corner or library being the highest. The increases in partner schools were higher than those in comparison schools.

Table 23: Creating a Literacy-Rich Classroom Environment

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. Display words, pictures, and print inside the classroom	40.0%	87.8%	95.7%	42.1%		64.8%
ii. Display words, pictures, and print outside the classroom	14.4%	41.9%	54.7%	20.1%		20.8%
iii. School has reading corner/library displaying reading or other materials	12.5%	67.6%	88.8%	17.6%		36.5%
iv. The materials are appropriate for the reading/instructional level	18.1%	64.2%	86.3%	23.3%		39.6%

Criterion 4: Check students' comprehension of what they are reading

Four activities, as described in Table 24, were observed to measure student understanding. Significant percentage increases occurred in all four activities. The increases in partner schools are higher than in comparison schools.

Table 24: Checking Students' Comprehension of What They Are Reading

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. Ask the students to tell the story they are reading	18.1%	66.9%	64.4%	20.1%		37.1%
ii. Raise questions about the content of their reading	46.9%	75.7%	82.0%	45.9%		61.0%
iii. Ask the students to create a story based on pictures presented to them	16.3%	49.3%	53.8%	19.5%		23.9%
iv. Ask the students to gauge the continuation of a story	11.9%	32.4%	41.0%	10.1%		14.4%

Criterion 5: Read aloud to students and ask students to read aloud using a range of materials to enhance their print and phonological awareness

Table 25 shows at least 50% increases in three of the four activities used to measure this criterion, with the highest percentage (90%) being “teacher showing picture to help students understand what they are reading.” The smallest increase (18%) was found in “reading poems, song lyrics.” Percentage increases also occurred in comparison schools, although the increases were not as high.

Table 25: Teacher Enhances Students' Print and Phonological Awareness

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. While reading, teachers/students identify punctuation marks	46.9%	80.4%	73.3%	54.1%		64.4%
ii. Teacher shows picture to help students understand what they are reading	42.5%	76.4%	80.7%	54.7%		61.3%
iii. Teacher asks questions when they/students read	51.3%	76.4%	80.1%	44.7%		60.0%
iv. Teachers/students read poems, song lyrics	44.4%	38.5%	52.2%	42.8%		26.3%

Criterion 6: Conduct regular and purposeful monitoring of students' progress in reading

During the baseline, the percentages for the comparison group for all four activities are higher than for the partner group. The third round of monitoring shows the opposite effect. In partner schools, more teachers were taking notes of students' performance when they read, and more teachers were keeping progress records and observing students' reading (Table 26).

Table 26: Conduct Regular and Purposeful Monitoring of Students' Progress in Reading

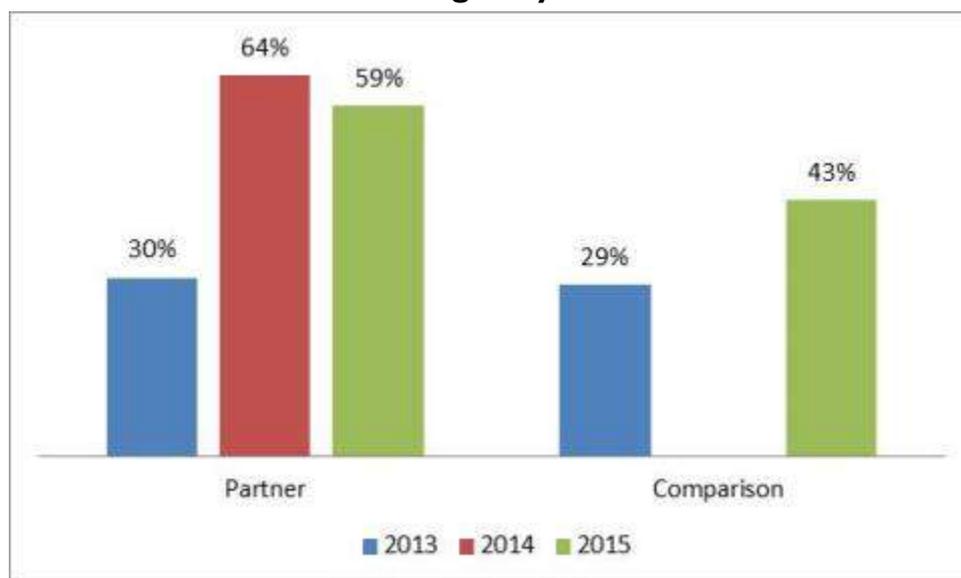
	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
i. Teacher listens to the way students read and whether they follow the punctuation marks	46.9%	76.4%	74.5%	50.3%		53.1%
ii. Teacher helps students who have difficulties in reading specific words	51.9%	74.3%	80.6%	59.7%		65.0%
iii. Teacher takes notes when the students read	8.1%	25.0%	36.9%	12.6%		22.6%
iv. Teacher keeps necessary progress records and observations of students' reading	6.3%	37.8%	41.3%	13.2%		20.6%

4.3.2 Early Grade Reading Materials Are Regularly Used

This indicator is measured by two criteria: (1) the percentage of early grade classes with regular reading periods and (2) the percentage of schools that allow students to take books home to read.

Figure 11 shows that during the second round of monitoring, partner schools experienced a significant increase in the percentage of early grade classes in which early grade reading materials were regularly used. During the midline, the percentage dropped a little, but was still much higher than the percentage in the comparison schools.

Figure 11: Percentage of Classrooms in Which Early Grade Reading Materials Are Regularly Used



The following describes in detail each of the two criteria of early grade reading. As shown in Table 27, the third round of monitoring found a very significant increase in the percentages of early grade classes that had regular reading periods, both in partner and in comparison schools.

The frequency of reading periods varied from once a week to six times a week (daily). During the baseline, about 50% of teachers said that no specified length of time was allocated for students to read; it varied each time. During the second round of monitoring, about 50% of teachers stated that they had dedicated between five and 30 minutes for student reading: half of them gave the students less than 15 minutes. That length of time might not be sufficient for students to develop a good understanding of what they read, but the teachers seem to have started to plan for reading time for students.

Table 27: Early Grade Classes That Have Regular Reading Periods and Allow Students to Take Reading Books Home to Read

	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
Have regular reading time	75.0%	94.6%	99.4%	76.1%		91.3%
Allow students to take books home	35.0%	65.5%	59.0%	35.2%		45.0%

Table 27 shows that, during the baseline, about 35% of teachers allowed their students to take reading books home to read. During the midline monitoring, the percentage in partner schools increased by 24%, while in comparison schools, the increase was 10%.

4.3.3 School Managers Initiate Activities to Create a School Reading Culture

The school community as a whole can play a role in developing positive attitudes towards reading. USAID PRIORITAS is working with leaders in partner schools to develop a whole-

school approach to reading that will focus on how reading can be at the heart of school policy, and how schools can do the following:

- a. Include school reading policies in their improvement plans
- b. Use funds to purchase age-appropriate reading materials (non-textbook)
- c. Upgrade school libraries
- d. Establish reading corners
- e. Set aside specific reading times during school hours
- f. Establish reading clubs
- g. Involve parents in reading activities
- h. Set up systems for home-based reading.

In Figure 12, baseline data indicates that, overall, 46% of partner schools meet the criterion “School managers initiate activities to create a reading culture.” This percentage increased to 78% at the second round of monitoring and to 91% at the midline monitoring for partner schools. The percentage of comparison schools increased slightly, from 49% at baseline to 54% at the midline monitoring.

Figure 12: Percentage of Sampled Primary Schools in Which Managers Initiated Activities to Create a Reading Culture

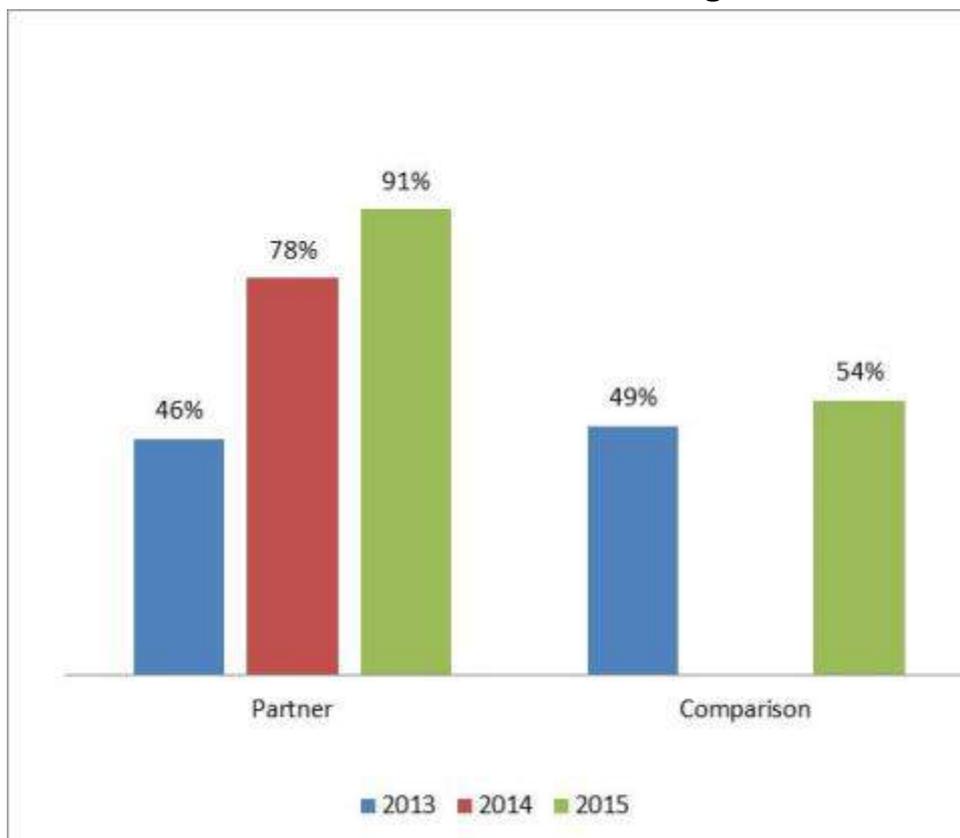


Table 28 presents the changes that have taken place in each of the eight criteria of the school reading culture indicator. The criteria involve two groups of activities: the first group

involves activities in schools, where the managers have more control (criteria “a” to “e”), and the second involves activities that could take place outside of the schools (criteria “f” to “h”), where the community and parents are expected to be more active. Baseline data (2013) in Table 28 clearly indicates that a much higher percentage of schools were implementing the first group of activities than the second group. However, the second and third round of monitoring data shows increases in percentages of schools fulfilling the criteria in both groups of activities. These increases are more notable in partner schools than in comparison schools.

Table 28: Percentage of Schools Implementing Activities to Promote a Reading Culture, by Sampled Group

	Primary Schools					
	Partner Schools			Comparison Schools		
	2013	2014	2015	2013	2014	2015
a. Include reading policies in school plan	33.6%	44.4%	74.5%	31.4%		41.4%
b. Use funds to purchase age appropriate reading materials (non-textbook)	55.0%	66.9%	76.6%	48.6%		59.3%
c. Upgrade school libraries	48.6%	72.6%	82.5%	47.9%		65.0%
d. Establish reading corners	12.9%	52.4%	86.9%	8.6%		25.7%
e. Set aside specific reading times during school hours	26.4%	41.9%	83.9%	30.0%		38.6%
f. Establish reading clubs	9.3%	33.9%	54.0%	10.7%		20.0%
g. Involve parents in reading activities	7.9%	21.8%	48.9%	11.4%		17.1%
h. Set up system for home-based reading	13.6%	25.8%	46.7%	17.9%		16.4%

4.4 Correlations between the Quality of Teaching and School Management and Students’ EGRA Scores in Sampled Groups

The findings from early grade teacher class observations and school data in this section show improvements, some of which were quite significant, in the way the early grade teachers were teaching. Improvements were also noted in the school management in promoting a reading culture. In general, these improvements are greater in partner schools, when compared to the improvements made in comparison schools.

Despite the above improvements demonstrated by teachers and schools, as well as increases in performance shown by students, it is difficult to make correlations between good teaching and good school management with improvement in student performance. This difficulty results from differences between the teachers and classes observed and the classes whose students participated in EGRA. Qualitative data was collected from observations of the early grade teachers in grade 1 and 2 classes, while the EGRA-assessed students were of grade 3. In other words, if there are two or three grade 3 classes, a grade

2 teacher who has been trained by the program may only have taught a percentage of the grade 3 students assessed in EGRA because the students were randomly selected from *all* grade 3 classes. Therefore, the contribution of good teaching to student improvement, if any, would only be partial.

Furthermore, time is needed for quantitative data to show impact in terms of student learning improvement. When midline monitoring was conducted, the teachers had just received the second round of training in which promotion of a reading culture is emphasized, and thus the impact would not yet be evident. The third round of training, which has a specific focus on early grade reading strategies using leveled readers, began to be implemented in quarter one of 2016. It is hoped that the endline monitoring will be able to capture the changes more completely.

5 How the Project Addresses the EGRA Findings



A teacher guides the students to use leveled reading books during a guided reading session.

The results of the project's Cohort 1 and Cohort 2 EGRAs have been used as a base to strengthen project activities in reading and to advocate for host government institutions, schools, communities, and parents to expand children's reading culture.

USAID PRIORITAS is working closely with national and local partners to improve the quality and relevance of teaching and learning in schools through pre- and in-service training; to develop better

management and governance in schools and districts; and to support better coordination within and between schools, teacher training institutions (TTIs), and the government at all levels.

The activities described by project component below are relevant and contribute to the reading and literacy program.

5.1 Component I: Improve the quality and relevance of teaching and learning in schools through pre- and in-service training.

5.1.1 Pre-service Teacher Training

Through the program with TTIs (pre-service institutions), the project includes activities as follows:

- Working with TTIs to develop new curricula and materials for pre-service training programs on good practices for teacher preparation courses for teaching reading;
- Training TTI lecturers in teaching early grade reading using leveled reading books;
- Distributing leveled reading books to and training TTI lab and partner schools in using them;
- Ensuring that courses for all teachers have an emphasis on developing language and literacy; and
- Incorporating training in strategies that are known to be effective in enhancing literacy development in planned training programs for early grade teachers.

5.1.2 In-service Teacher Training

Through the planned project in-service training program with partner schools, the project includes activities as follows:

- Providing specific and more comprehensive training for early grade teachers in teaching language and literacy, including developing student comprehension and accommodating individual students' needs;

- Distributing kits of leveled reading books to partner schools and non-partner schools within partner districts that receive training; and
- Training teachers of all subjects and grades to use instructional strategies to develop language and literacy.

5.2 Component 2: Develop better management and governance in schools and districts.

5.2.1 Districts, Schools, and Community/Parents

Through the school management and community participation training, the project includes activities as follows:

- Working with schools to develop initiatives to improve reading such as explicit school policies for reading, upgrading libraries, creating reading corners, setting up literacy working groups, and developing strategies for parents to support students' reading;
- Allocating a day of the planned school-based management training for local government staff, school principals, committees, and parents to train them in how to support improvements in early grade teaching of reading; and
- Providing a selection of reading books to partner schools to encourage and support their programs to improve reading.

5.3 Component 3: Support better coordination within and between schools, TTIs, and the government at all levels.

5.3.1 Advocacy

The project has increased the focus of its work with MOEC and the Ministry of Religious Affairs (MORA) and provincial and district governments on reviewing current practices and resources and developing policies and initiatives to support improved student reading, including increasing the amount of time and resources allocated to supporting reading development. At MOEC's request, the project is currently identifying project partner districts with strong commitments to developing and promoting a literacy culture.

5.3.2 USA-Indonesia TTI Partnership

The project has established a USA-Indonesia TTI partnership between Florida State University and the State University of Semarang to:

- Develop curricula and courses for pre- and in-service teacher training in developing reading and literacy, especially in the early grades;
- Develop and pilot supporting training and classroom materials; and
- Roll out these courses and materials to other TTIs.

5.3.3 Providing Leveled Readers to Schools and Training Teachers in Their Use

The project has worked in collaboration with Yayasan Literasi Anak Indonesia (YLAI) to:

- Finish reviewing and revising leveled reading books that are suitable for use with children in the early grades to support their reading development;

- Supply the books to selected project partner schools; and
- Conduct workshops with schools receiving books, to pilot their use to support improving students' reading skills.

Annex I: Early Grade Reading Assessment: Indonesian Language

Penilaian Membaca Kelas Awal
Petunjuk dan Tatacara bagi Pelaksana, November 2015
(Versi Tablet)

BAHASA INDONESIA

Petunjuk Umum:

Hal utama yang harus diperhatikan dalam penilaian ini adalah menjalin hubungan yang akrab dan santai dengan siswa-siswa yang akan dinilai, misalnya melalui percakapan sederhana seputar topik yang mereka sukai (lihat contoh di bawah ini). Siswa harus merasa penilaian ini sebagai kegiatan yang dapat dinikmati, bukan sebagai tugas yang sulit. Penting diingat untuk membacakan **hanya** bagian yang terdapat dalam kotak dengan suara nyaring, pelan, dan jelas.

Selamat pagi/siang. Nama saya (Ibu/Bapak/Kakak) _____ . Saya (Ibu/Bapak/kakak) dari _____, dan saya (Bapak/Ibu/kakak) ke sini untuk bertemu dengan kamu dan berbincang-bincang sedikit.

Siapa namamu? Kamu tinggal dengan siapa di rumah? Kamu belajar apa pagi ini/kemarin? [Jika mereka tampak nyaman, lanjutkan ke bagian persetujuan verbal].

Persetujuan Verbal:

- **Saya (Ibu/Bapak/kakak) ke sini untuk melihat bagaimana anak-anak kelas tiga belajar membaca. Kebetulan kamu terpilih. Kamu bersedia kan?**
- **Kita akan menggunakan alat ini (tunjukkan tablet).**
- **Kamu akan diminta untuk membaca huruf-huruf, kata-kata, dan cerita pendek dengan suara nyaring.**
- **Ini bukan ujian, jadi kita santai saja.**
- **Nama kamu tidak ditulis di sini, jadi tidak ada yang tahu ini jawaban dari siapa.**
- **Jika kamu tidak menjawab, atau tidak tahu jawabannya, juga tidak apa-apa.**
- **Kamu bersedia kan ?**

Tandai kotak jika telah mendapatkan persetujuan verbal:

Jika tidak didapatkan persetujuan verbal, ucapkan terima kasih pada anak dan lanjutkan dengan anak berikutnya, menggunakan lembar yang sama.

Jika sudah didapatkan persetujuan verbal, lengkapi informasi di bawah ini.

Lokasi Sekolah

1. Provinsi:	
2. Kabupaten:	
3. Kode:	
4. Sekolah:	

Informasi Siswa

1. Masuk sekolah?	<input type="checkbox"/> 0 = Pagi <input type="checkbox"/> 1 = Siang <input type="checkbox"/> 2 = Sepanjang hari
2. Kelas siswa?	<input type="checkbox"/> 0 = Dua <input type="checkbox"/> 1 = Tiga <input type="checkbox"/> 2 = Empat
3. Apakah kamu belajar bersama kelas lain seperti kelas 1, kelas 2 atau kelas 4 dalam ruang kelas yang sama?	<input type="checkbox"/> 1 = Ya <input type="checkbox"/> 0 = Tidak
4. Usia Siswa:	<input type="checkbox"/> 0 = Tujuh <input type="checkbox"/> 1 = Delapan <input type="checkbox"/> 2 = Sembilan <input type="checkbox"/> 3 = Lebih dari sembilan
5. Jenis kelamin siswa:	<input type="checkbox"/> 0 = Laki-laki <input type="checkbox"/> 1 = Perempuan
6. Bahasa apa yang paling sering kamu gunakan di rumah?	<input type="checkbox"/> 1 = Bahasa Indonesia <input type="checkbox"/> 2 = Bahasa yang lain
7. Apakah ada bacaan seperti buku cerita atau majalah di rumah ?	<input type="checkbox"/> 1 = Ya <input type="checkbox"/> 0 = Tidak
8. Apakah di rumah kamu membaca buku bersama-sama dengan orang lain? (Kalau jawabannya ya), dengan siapa?	<input type="checkbox"/> 1 = Ya <input type="checkbox"/> 0 = Tidak
9. Sebelum masuk ke SD/MI, apakah kamu pernah masuk TK atau PAUD ?	<input type="checkbox"/> 1 = Ya <input type="checkbox"/> 0 = Tidak

Bagian I: Mengenal Huruf

Perlihatkan lembar huruf-huruf berikut ini. Katakan:

Di lembar ini terdapat huruf-huruf dalam bahasa Indonesia. Sebutkan nama huruf-huruf ini sebanyak-banyaknya.

Contoh: Nama huruf ini [tunjuk huruf L] adalah “L” (baca: “el”).

Mari kita coba: sebutkan nama huruf ini [tunjuk huruf A]:

Jika siswa membaca dengan benar, katakan: Bagus, nama huruf ini adalah “A”.

Jika siswa tidak membaca dengan benar, katakan: Nama huruf ini adalah “A”.

Sekarang coba yang lainnya: Sebutkan nama huruf ini [tunjuk huruf i].

Jika siswa membaca dengan benar, katakan: Bagus, nama huruf ini adalah “i”.

Jika siswa tidak membaca dengan benar, katakan: Nama huruf ini adalah “i”.

Jika saya katakan mulai, sebutkan nama huruf-huruf ini dengan cepat dan benar, dari sini ke sini.

[Tunjuk huruf pertama pada baris pertama dan seterusnya hingga huruf kesepuluh pada baris pertama] dan lanjutkan ke baris berikut hingga akhir. Jika kamu tidak tahu nama hurufnya, lanjutkan dengan nama huruf berikutnya. Saya akan tetap diam dan mendengarmu. Siap? Mari kita mulai!



Tekan tombol ‘Start’. Setelah semua huruf muncul di layar, katakan pada siswa “Silakan mulai.”

Ikuti huruf yang disebutkan oleh siswa pada layar. Tekan huruf yang dibaca salah. Huruf tersebut akan berubah warna menjadi biru. Jawaban yang dikoreksi siswa dan koreksiannya benar maka dianggap benar dan diperbaiki dengan menekan kembali huruf yang telah disalahkan. Sekarang hurufnya akan berubah menjadi abu-abu. Tetaplah diam, kecuali jika siswa ragu atau terhenti selama 3 detik, tunjuk huruf berikut dan katakan “Silahkan lanjutkan”. Huruf yang terlewat ditandai salah.

Jika siswa menyebutkan bunyi hurufnya dan bukan nama hurufnya, katakan “Coba sebutkan NAMA huruf ini”. Bantuan seperti ini hanya dapat diberikan satu kali dalam subtugas ini.

Jika waktunya habis sebelum siswa selesai membaca, layar akan berubah menjadi merah dan pengatur waktunya (Timer) akan berhenti. Minta siswa untuk berhenti membaca. tekan huruf terakhir yang dibaca, tanda kurung tutup berwarna akan muncul pada huruf yang ditandai. Untuk melanjutkan, tekan tombol “Next”.

Jika siswa selesai membaca sebelum layarnya berubah menjadi merah, hentikan pengatur waktunya seketika siswa selesai menyebutkan huruf terakhir. Kurung tutup berwarna merah akan muncul di huruf terakhir. Tekan tombol “Next” untuk melanjutkan.

Aturan berhenti lebih awal Jika siswa tidak menyebutkan satupun huruf pada baris pertama dengan benar, layar akan berubah warna jadi merah. Katakan “terima kasih” kepada siswa, hentikan subtugas ini dan lanjutkan ke subtugas berikutnya.

1	2	3	4	5	6	7	8	9	10	
G	n	i	S	t	m	E	b	U	A	(10)
e	r	P	u	j	s	D	A	E	i	(20)
N	i	V	a	E	c	Y	U	W	d	(30)
M	k	t	J	n	V	i	h	N	S	(40)
e	F	u	N	a	L	s	T	K	p	(50)
T	a	e	H	f	b	L	u	O	C	(60)
k	N	d	P	u	C	R	n	A	g	(70)
r	H	A	S	k	i	n	L	U	M	(80)
A	r	Y	U	a	D	O	Z	A	i	(90)
m	a	K	t	R	B	e	N	g	d	(100)

Bagian 2. Membaca Kata

Perlihatkan lembar kata pada anak. Katakan:

Berikut ini adalah daftar kata. Bacalah kata-kata ini sebanyak mungkin dengan teliti, jangan dieja. Contoh, kata ini adalah: “makan”.

Mari kita coba: Bacalah kata berikut [tunjuk kata “sakit”]:

Jika siswa membaca dengan benar, katakan: Bagus, kata ini adalah “sakit”.

Jika siswa tidak membaca dengan benar, katakan: Kata ini adalah “sakit”.

Sekarang coba yang lainnya: Bacalah kata berikut [tunjuk kata “kuda”]:

Jika siswa membaca dengan benar, katakan: Bagus, kata ini adalah “kuda”.

Jika siswa tidak membaca dengan benar, katakan: Kata ini adalah “kuda”.

Ketika saya katakan mulai, bacalah kata-kata ini secepatnya mulai dari baris pertama dari kiri ke kanan, lalu baris berikutnya dari kiri ke kanan dan seterusnya. Saya akan tetap diam dan mendengarmu. Apakah kamu siap? Apakah sudah siap? Mari kita mulai!



Tekan tombol ‘Start’. Setelah semua kata muncul di layar, katakan pada siswa “Silakan mulai.”

Ikuti kata yang dibaca oleh siswa pada layar. Tekan kata yang dibaca salah. Kata tersebut akan berubah warna menjadi biru. Jawaban yang dikoreksi siswa dan koreksiannya benar maka dianggap benar dan diperbaiki dengan menekan kembali kata yang telah disalahkan. Sekarang katanya akan berubah menjadi abu-abu.

Tetaplah diam, kecuali jika siswa ragu atau terhenti selama 3 detik, tunjuk kata berikut dan katakan “Silahkan lanjutkan”. Kata yang terlewat ditandai salah..

Jika waktunya habis sebelum siswa selesai membaca, layar akan berubah menjadi merah dan pengatur waktunya (Timer) akan berhenti. Minta siswa untuk berhenti membaca. tekan kata terakhir yang dibaca, tanda kurung tutup berwarna akan muncul pada kata yang ditandai. Untuk melanjutkan, tekan tombol “Next”.

Jika siswa selesai membaca sebelum layarnya berubah menjadi merah, hentikan pengatur waktunya seketika siswa selesai menyebutkan kata terakhir. Kurung tutup berwarna merah akan muncul di kata terakhir. Tekan tombol “Next” untuk melanjutkan.

Aturan berhenti lebih awal Jika siswa tidak menyebutkan satupun kata pada baris pertama dengan benar, layar akan berubah warna jadi merah. Katakan “terima kasih” kepada siswa, hentikan subtugas ini dan lanjutkan ke subtugas berikutnya.

Contoh:	makan	sakit	kuda		
	1	2	3	4	5
rumah	bulan	rajin	terima	dengan	(5)
bisa	harus	anak	suka	hidup	(10)
sekali	kasih	ayam	teman	kita	(15)
ayah	hujan	agar	pagi	desa	(20)
ada	hanya	masuk	tidur	besar	(25)
sehat	hutan	akan	tiba	selalu	(30)
jika	merah	kamu	tidak	orang	(35)
telah	putih	ingin	emas	pulang	(40)
karena	baru	bunga	kelas	hari	(45)
ikan	sakit	senang	juga	kebun	(50)

Bagian 3. Membaca Kata yang Tidak Mempunyai Arti

Perlihatkan lembar kata-kata pada anak. Katakan:

Berikut ini adalah beberapa kata-kata yang tidak ada artinya. Bacalah sebanyak mungkin dengan benar. Jangan mengeja, tolong dibaca seperti yang tertulis. Contoh, kata ini adalah: “mab”.

Mari kita coba: Bacalah kata berikut ini [tunjuk kata “kadi”]:

[Jika siswa membaca dengan benar, katakan]: “Bagus sekali: “kadi”.

[Jika anak tidak membaca dengan benar, katakan]: Kata ini dibaca “kadi.”

Sekarang coba yang lainnya: Bacalah kata berikut ini [tunjuk kata berikutnya “ehit”].

[Jika anak membaca dengan benar, katakan]: Bagus sekali: “ehit”.

[Jika anak tidak membaca dengan benar, katakan]: Kata ini dibaca “ehit”.

Ketika saya katakan mulai, bacalah kata-kata ini secepatnya mulai dari baris pertama, dari kiri ke kanan, dan lanjutkan ke baris berikutnya. Saya akan tetap diam dan mendengarmu. Apakah kamu siap? Mari kita mulai!



Tekan tombol ‘Start’. Setelah semua kata muncul di layar, katakan pada siswa “Silakan mulai.”

Ikuti kata yang dibaca oleh siswa pada layar. Tekan kata yang dibaca salah. Kata tersebut akan berubah warna menjadi biru. Jawaban yang dikoreksi siswa dan koreksiannya benar maka dianggap benar dan diperbaiki dengan menekan kembali kata yang telah disalahkan. Sekarang katanya akan berubah menjadi abu-abu.

Tetaplah diam, kecuali jika siswa ragu atau terhenti selama 3 detik, tunjuk kata berikut dan katakan “Silahkan lanjutkan”. Kata yang terlewat ditandai salah..

Jika waktunya habis sebelum siswa selesai membaca, layar akan berubah menjadi merah dan pengatur waktunya (Timer) akan berhenti. Minta siswa untuk berhenti membaca. tekan kata terakhir yang dibaca, tanda kurung tutup berwarna akan muncul pada kata yang ditandai. Untuk melanjutkan, tekan tombol “Next”.

Jika siswa selesai membaca sebelum layarnya berubah menjadi merah, hentikan pengatur waktunya seketika siswa selesai menyebutkan kata terakhir. Kurung tutup berwarna merah akan muncul di kata terakhir. Tekan tombol “Next” untuk melanjutkan.

Aturan berhenti lebih awal Jika siswa tidak menyebutkan satupun kata pada baris pertama dengan benar, layar akan berubah warna jadi merah. Katakan “terima kasih’ kepada siswa, hentikan subtugas ini dan lanjutkan ke subtugas berikutnya.

Contoh:	mab	kadi	ehit		
	1	2	3	4	5
tasang	asib	lukad	sakel	ganu	(5)
tecap	urgu	tohi	numo	sabi	(10)
irad	madal	hetal	lauka	akum	(15)
mahur	ipat	kaketi	malad	tagi	(20)
duhas	iar	taka	rehu	tukun	(25)
halada	abija	tiu	nukut	umak	(30)
weba	napum	nabol	naki	lusela	(35)
sema	tadap	wijab	satang	ulal	(40)
kaluh	saib	kidat	riha	halet	(45)
manum	tipa	atak	osed	kareme	(50)

Bagian 4a: Kelancaran Membaca Nyaring

Perlihatkan bacaan berikut pada anak. Katakan:

Ini adalah sebuah cerita pendek. Tolong dibaca dengan suara nyaring, cepat dan teliti. Ketika kamu selesai, saya akan bertanya mengenai apa yang sudah kamu baca. Ketika saya katakan mulai, bacalah cerita ini sebaik-baiknya. Saya akan tetap diam dan mendengarmu. Apakah kamu siap? Mari kita mulai!



Minta siswa untuk memulai setelah menekan tombol “Start”

- Ikuti kata yang dibaca pada Tablet dan tandai kata-kata yang salah.
- Koreksi diri/pengulangan yang benar dari siswa dianggap benar.
- **Tetap diam.** Jika siswa terlihat ragu selama 3 detik, tunjuk kata berikutnya dan katakan “**Silahkan lanjutkan.**” Tandai salah pada kata yang terlewati.

Setelah 60 detik berlalu, katakan “Stop.” Tandai kata terakhir yang dibaca dengan menekan kata tersebut.

Berhenti! Jika siswa tidak membaca dengan benar satu kata pun pada baris pertama, katakan “**Terima Kasih!**” hentikan kegiatan ini, lanjutkan kegiatan berikutnya.

		Ajukan pertanyaan yang berkaitan dengan kata-kata yang dibaca anak.	Benar	Salah	Tidak ada jawaban
Dani mempunyai seekor kucing	4	Hewan apa yang dimiliki Dani? (kucing)			
Dani sangat menyayangi kucingnya. Dia selalu mengajaknya bermain.	12	Apa yang selalu dilakukan Dani bersama kucingnya? (bermain)			
Suatu pagi kucing itu mengeong terus. Dani memeriksanya dengan hati-hati. Dani sangat terkejut karena ada luka di kaki kucingnya.	31	Mengapa kucing mengeong terus? (sakit/kucingnya sakit/ada luka di kakinya/kakinya berdarah)			
Dani bersedih, lalu memberitahu ibunya. Ibu Dani segera mengobatinya.	40	Siapa yang mengobati kucing Dani? (ibu Dani/sinonim ‘ibu’)			
Ibu Dani seorang dokter hewan. Kucing Dani sekarang lincah dan dapat bermain lagi. Sekarang Dani kembali riang.	57	Mengapa Dani kembali riang? (kucingnya sembuh/kucingnya tidak sakit lagi/ kucingnya bisa bermain kembali/diobati ibunya/jawaban lain yang dapat disimpulkan dari bacaan)			

Bagian 4b: Pemahaman Bacaan

Ketika waktu 60 detik telah habis atau apabila siswa dapat menyelesaikan bahan bacaan kurang dari 60 detik, ambil cerita tersebut dari anak, dan ajukan pertanyaan di bawah ini.

Berikan waktu maksimal **15 detik** pada anak untuk menjawab setiap pertanyaan. Tandai jawaban anak, dan lanjutan pada pertanyaan berikutnya.

Sekarang saya akan memberikan beberapa pertanyaan tentang cerita yang baru saja kamu baca. Cobalah menjawab pertanyaannya sebaik-baiknya.

Bagian 5: Menyimak

Ini bukan kegiatan yang dihitung waktunya dan tidak ada lembar bacaan siswa. Bacalah dengan nyaring cerita di bawah ini hanya **satu kali** secara perlahan, kira-kira 1 kata per detik. Katakan:

Saya akan membacakan sebuah cerita lalu memberikan beberapa pertanyaan padamu.

Dengarkan baik-baik dan jawablah pertanyaannya. Siap? Mari mulai.

Bacakanlah cerita berikut ini:

Lina berjalan kaki ke sekolah. Dia harus berangkat pagi-pagi karena sekolahnya jauh. Lina membutuhkan sepeda. Dia menabung untuk membeli sepeda. Sekarang Lina ke sekolah bersama teman-temannya naik sepeda.

Berikan waktu **maksimal 15 detik** pada siswa untuk menjawab pertanyaannya. Tandai jawaban anak, dan lanjutkan pada pertanyaan berikutnya.

Tanyakanlah pertanyaan-pertanyaan berikut ini:

Pertanyaan	Jawaban	Tanggapan		
		Benar	Salah	Tidak ada jawaban
Ke mana Lina berjalan kaki?	Ke sekolah			
Untuk apa Lina menabung?	Sepeda/beli sepeda/untuk membeli sepeda			
Mengapa Lina membutuhkan sepeda?	Karena tidak mau berangkat pagi-pagi/tidak mau bangun pagi/mau berangkat bersama teman-temannya/teman-temannya punya sepeda/sekolahnya jauh/mau hemat waktu/lebih cepat naik sepeda/jawaban lain yang dapat disimpulkan dari bacaan.			

Annex 2: Early Grade Reading Assessment Schools

No.	Province	District	Treatment	School Name	Type	Status
1	Aceh	Aceh Barat Daya	Partner	SDN I Meunasah Sukon	SD	Public
2	Aceh	Aceh Barat Daya	Partner	SDN Baharu	SD	Public
3	Aceh	Aceh Barat Daya	Partner	SDN Cot Bak U	SD	Public
4	Aceh	Aceh Barat Daya	Partner	MIN Paoh Padang	MI	Public
5	Aceh	Aceh Barat Daya	Comparison	SDN Kedai Manggeng	SD	Public
6	Aceh	Aceh Barat Daya	Comparison	SDN Ladang	SD	Public
7	Aceh	Aceh Barat Daya	Comparison	SDN Seuneulop	SD	Public
8	Aceh	Aceh Barat Daya	Comparison	MIN KP Rawa	MI	Public
9	Aceh	Aceh Tamiang	Partner	SDN I Bukit Tempurung	SD	Public
10	Aceh	Aceh Tamiang	Partner	SDN Seruway	SD	Public
11	Aceh	Aceh Tamiang	Partner	SDN Tanah Merah	SD	Public
12	Aceh	Aceh Tamiang	Partner	MIN Kampung Durian	MI	Public
13	Aceh	Aceh Tamiang	Comparison	SDN I Kuala Simpang	SD	Public
14	Aceh	Aceh Tamiang	Comparison	SDN I Rantau Pauh	SD	Public
15	Aceh	Aceh Tamiang	Comparison	SDN Muka Sungai Kuruk	SD	Public
16	Aceh	Aceh Tamiang	Comparison	MIN Simpang Upah	MI	Public
17	Aceh	Aceh Utara	Partner	SDN I Tanah Jambo Aye	SD	Public
18	Aceh	Aceh Utara	Partner	SDN 10 Seunuddon	SD	Public
19	Aceh	Aceh Utara	Partner	SDN 5 Seunuddon	SD	Public
20	Aceh	Aceh Utara	Partner	MIN Pantonlabu	MI	Public
21	Aceh	Aceh Utara	Comparison	SDN I Baktiya	SD	Public
22	Aceh	Aceh Utara	Comparison	SDN 5 Baktiya	SD	Public
23	Aceh	Aceh Utara	Comparison	SDN 5 Baktiya Barat	SD	Public
24	Aceh	Aceh Utara	Comparison	MIN Sampoiniet	MI	Public
25	Aceh	Pidie Jaya	Partner	SDN 5 Meureudu	SD	Public
26	Aceh	Pidie Jaya	Partner	SDN Rhieng	SD	Public
27	Aceh	Pidie Jaya	Partner	MIN Jeulanga	MI	Public
28	Aceh	Pidie Jaya	Comparison	SDN I Ulim	SD	Public
29	Aceh	Pidie Jaya	Comparison	SDN Antara	SD	Public
30	Aceh	Pidie Jaya	Comparison	SDN Kuta Bate	SD	Public
31	Aceh	Pidie Jaya	Comparison	MIN Kuta Rentang	MI	Public
32	N. Sumatra	Langkat	Partner	SDN 050660 Kuala Bingai	SD	Public
33	N. Sumatra	Langkat	Partner	SDN 050661 Kuala Bingai	SD	Public
34	N. Sumatra	Langkat	Partner	SDN 050728 Tanjung Pura	SD	Public
35	N. Sumatra	Langkat	Partner	MIN Paluh Nipah	MI	Public
36	N. Sumatra	Langkat	Comparison	SDN 054929 Kampung Baru Pasar VIII	SD	Public
37	N. Sumatra	Langkat	Comparison	SDN 050594 Sambirejo	SD	Public
38	N. Sumatra	Langkat	Comparison	SDN 053970 Perdamean	SD	Public
39	N. Sumatra	Langkat	Comparison	MIN Tanjung Mulia	MI	Public
40	N. Sumatra	Toba Samosir	Partner	SD Swasta HKBP I Balige	SD	Private
41	N. Sumatra	Toba Samosir	Partner	SDN 173524 Balige	SD	Public
42	N. Sumatra	Toba Samosir	Partner	SDN 173551 Laguboti	SD	Public
43	N. Sumatra	Toba Samosir	Partner	MIN Lumban Gurning Porsea	MI	Public
44	N. Sumatra	Toba Samosir	Comparison	SDN 173529 Tampahan	SD	Public
45	N. Sumatra	Toba Samosir	Comparison	SDN 173582 Sigumpar	SD	Public

No.	Province	District	Treatment	School Name	Type	Status
46	N. Sumatra	Toba Samosir	Comparison	SDN 173592 Sigumpar	SD	Public
47	N. Sumatra	Toba Samosir	Comparison	SDN 175803 Tampahan	SD	Public
48	Banten	Kota Tangerang Selatan	Partner	SDN Jelupang 1	SD	Public
49	Banten	Kota Tangerang Selatan	Partner	SDN Kademangan 1	SD	Public
50	Banten	Kota Tangerang Selatan	Partner	SDS Al Amanah	SD	Private
51	Banten	Kota Tangerang Selatan	Partner	MI l'anatul Huda	MI	Private
52	Banten	Kota Tangerang Selatan	Comparison	SDN Cireundeu 2	SD	Public
53	Banten	Kota Tangerang Selatan	Comparison	SDN Pucung 2	SD	Public
54	Banten	Kota Tangerang Selatan	Comparison	MI Miftah Sa'adah	MI	Private
55	Banten	Kota Tangerang Selatan	Comparison	MI Nurul Falah Pondok Ranji	MI	Private
56	Banten	Tangerang	Partner	SDN Campaka 3	SD	Public
57	Banten	Tangerang	Partner	SDN Sodong 1	SD	Public
58	Banten	Tangerang	Partner	MI Al Husein	MI	Private
59	Banten	Tangerang	Partner	MI Syech Mubarak	MI	Private
60	Banten	Tangerang	Comparison	SDN Panongan 3	SD	Public
61	Banten	Tangerang	Comparison	SDN Rancabuaya 1	SD	Public
62	Banten	Tangerang	Comparison	MI Al Ittihad Daru	MI	Private
63	Banten	Tangerang	Comparison	MI Darussalam	MI	Private
64	West Java	Bekasi	Partner	SDN 1 Jayamukti	SD	Public
65	West Java	Bekasi	Partner	SDN 2 Hegarmukti	SD	Public
66	West Java	Bekasi	Partner	SDN 6 Sukaesmi	SD	Public
67	West Java	Bekasi	Partner	MI At Taqwa	MI	Private
68	West Java	Bekasi	Comparison	SDN 1 Sertajaya	SD	Public
69	West Java	Bekasi	Comparison	SDN 1 Simpangan	SD	Public
70	West Java	Bekasi	Comparison	SDN 2 Sertajaya	SD	Public
71	West Java	Bekasi	Comparison	MIS Nurul Yaqin	MI	Private
72	West Java	Cirebon	Partner	SDN 1 Cangkoak	SD	Public
73	West Java	Cirebon	Partner	SDN 1 Panembahan	SD	Public
74	West Java	Cirebon	Partner	SDN 2 Panembahan	SD	Public
75	West Java	Cirebon	Partner	MIN Sindangmekar	MI	Public
76	West Java	Cirebon	Comparison	SDN 2 Pegagan	SD	Public
77	West Java	Cirebon	Comparison	SDN 2 Setu Wetan	SD	Public
78	West Java	Cirebon	Comparison	SDN 3 Setu Wetan	SD	Public
79	West Java	Cirebon	Comparison	MI Alwahdah	MI	Private
80	West Java	Kuningan	Partner	SDN 1 Cilimus	SD	Public
81	West Java	Kuningan	Partner	SDN 1 Purwasari	SD	Public
82	West Java	Kuningan	Partner	SDN 3 Lengkong	SD	Public
83	West Java	Kuningan	Partner	MIN Maniskidul	MI	Public
84	West Java	Kuningan	Comparison	SDN 1 Kertayasa	SD	Public
85	West Java	Kuningan	Comparison	SDN Jambugeulis	SD	Public
86	West Java	Kuningan	Comparison	SDN Tirtawangunan	SD	Public
87	West Java	Kuningan	Comparison	MI Manbaul Ulum	MI	Private

No.	Province	District	Treatment	School Name	Type	Status
88	West Java	Tasikmalaya	Partner	SDN Bugel Alis	SD	Public
89	West Java	Tasikmalaya	Partner	SDN Citatah	SD	Public
90	West Java	Tasikmalaya	Partner	SDN 3 Pakemitan	SD	Public
91	West Java	Tasikmalaya	Partner	MI Cicarulang	MI	Private
92	West Java	Tasikmalaya	Comparison	SDN I Dirgahayu	SD	Public
93	West Java	Tasikmalaya	Comparison	SDN I Kadipaten	SD	Public
94	West Java	Tasikmalaya	Comparison	SDN Salebu	SD	Public
95	West Java	Tasikmalaya	Comparison	MIS Nurul Ikhsan	MI	Private
96	Central Java	Pekalongan	Partner	SD Muhammadiyah Kajen	SD	Private
97	Central Java	Pekalongan	Partner	SDN 01 Kampil	SD	Public
98	Central Java	Pekalongan	Partner	SDN Pekiringanalit 3	SD	Public
99	Central Java	Pekalongan	Partner	MI Salafiyah Warulor	MI	Private
100	Central Java	Pekalongan	Comparison	SD Muhammadiyah 3 Pekajangan	SD	Private
101	Central Java	Pekalongan	Comparison	SDN 02 Pakis	SD	Public
102	Central Java	Pekalongan	Comparison	SDN 03 Kedungwuni	SD	Public
103	Central Java	Pekalongan	Comparison	MI Salafiyah Tanjung	MI	Private
104	Central Java	Wonosobo	Partner	SDN I Bojasari	SD	Public
105	Central Java	Wonosobo	Partner	SDN 2 Jengkol	SD	Public
106	Central Java	Wonosobo	Partner	SDN Siwuran	SD	Public
107	Central Java	Wonosobo	Partner	MI Muhammadiyah Kertek	MI	Private
108	Central Java	Wonosobo	Comparison	SDN I Kalibeber	SD	Public
109	Central Java	Wonosobo	Comparison	SDN I Kalikajar	SD	Public
110	Central Java	Wonosobo	Comparison	SDN I Kejajar	SD	Public
111	Central Java	Wonosobo	Comparison	MI Ma'arif Kliwonan	MI	Private
112	East Java	Lumajang	Partner	SDN Denok	SD	Public
113	East Java	Lumajang	Partner	SDN Jogotrunan	SD	Public
114	East Java	Lumajang	Partner	SDN Kuteranon 01	SD	Public
115	East Java	Lumajang	Partner	MI Nurul Islam Selok Besuki	MI	Private
116	East Java	Lumajang	Comparison	SDN Dawuhan Lor I	SD	Public
117	East Java	Lumajang	Comparison	SDN Kepuhharjo 2	SD	Public
118	East Java	Lumajang	Comparison	SDN Tompokersan 3	SD	Public
119	East Java	Lumajang	Comparison	MI Nurul Islam Kota Lumajang	MI	Private
120	East Java	Ngawi	Partner	SDN Guyung 2	SD	Public
121	East Java	Ngawi	Partner	SDN Tambakromo I	SD	Public
122	East Java	Ngawi	Partner	SDN Widodaren I	SD	Public
123	East Java	Ngawi	Partner	MIN Mlarik Baderan	MI	Public
124	East Java	Ngawi	Comparison	SDN Kendung	SD	Public
125	East Java	Ngawi	Comparison	SDN Klitik I	SD	Public
126	East Java	Ngawi	Comparison	SDN Paron I	SD	Public
127	East Java	Ngawi	Comparison	MIN Gelung Paron	MI	Public
128	S. Sulawesi	Bone	Partner	SD Inpres 10/73 Bajoe	SD	Public
129	S. Sulawesi	Bone	Partner	SD Inpres 12/79 Lonrae	SD	Public
130	S. Sulawesi	Bone	Partner	SD Inpres 6/75 Pacing	SD	Public
131	S. Sulawesi	Bone	Partner	SD Inpres 6/80 Latteko	SD	Public
132	S. Sulawesi	Bone	Comparison	SDN 17 Bajoe	SD	Public
133	S. Sulawesi	Bone	Comparison	SDN 20 Panyula	SD	Public
134	S. Sulawesi	Bone	Comparison	SDN 48 Pacing	SD	Public
135	S. Sulawesi	Bone	Comparison	SDN 50 Jaling	SD	Public

No.	Province	District	Treatment	School Name	Type	Status
136	S. Sulawesi	Kota Parepare	Partner	SDN 12 Parepare	SD	Public
137	S. Sulawesi	Kota Parepare	Partner	SDN 34 Parepare	SD	Public
138	S. Sulawesi	Kota Parepare	Partner	SDN 35 Parepare	SD	Public
139	S. Sulawesi	Kota Parepare	Partner	MI DDI Ujung Lare	MI	Private
140	S. Sulawesi	Kota Parepare	Comparison	SDN 28 Bacukiki	SD	Public
141	S. Sulawesi	Kota Parepare	Comparison	SDN 43 Soreang	SD	Public
142	S. Sulawesi	Kota Parepare	Comparison	SDN 55 Ujung	SD	Public
143	S. Sulawesi	Kota Parepare	Comparison	MI DDI Labukang	MI	Private
144	S. Sulawesi	Pidie Jaya	Partner	SDN Teupin Pukat	SD	Public
145	S. Sulawesi	Takalar	Partner	SDN 103 Inpres Sompur	SD	Public
146	S. Sulawesi	Takalar	Partner	SDN 226 Inpres Lanna	SD	Public
147	S. Sulawesi	Takalar	Partner	SDN 234 Takalar kota	SD	Public
148	S. Sulawesi	Takalar	Partner	MIN Galesong Utara	MI	Public
149	S. Sulawesi	Takalar	Comparison	SDN 147 Inpres Pa'lalakkang	SD	Public
150	S. Sulawesi	Takalar	Comparison	SDN 150 Inpres Tamala'rang	SD	Public
151	S. Sulawesi	Takalar	Comparison	SDN 151 Inpres Kalampa	SD	Public
152	S. Sulawesi	Takalar	Comparison	SDN 190 Inpres Bura'ne	SD	Public
153	S. Sulawesi	Tana Toraja	Partner	SDN 102 Makale 5	SD	Public
154	S. Sulawesi	Tana Toraja	Partner	SDN 183 Inpres Balla Bittuang	SD	Public
155	S. Sulawesi	Tana Toraja	Partner	SDN 187 Bittuang	SD	Public
156	S. Sulawesi	Tana Toraja	Partner	MIN Makale	MI	Public
157	S. Sulawesi	Tana Toraja	Comparison	SDN 120 Buntu Masakke	SD	Public
158	S. Sulawesi	Tana Toraja	Comparison	SDN 126 Garampa'	SD	Public
159	S. Sulawesi	Tana Toraja	Comparison	SDN 161 Leppan	SD	Public
160	S. Sulawesi	Tana Toraja	Comparison	SDN 184 Inpres Ulusalu	SD	Public

Annex 3: List of Assessors

No	Province	Name	Position	Institution
1	Aceh	Adek Elfera. C.	Teacher	MIN Rukoh B. Aceh
2	Aceh	Adi Saleh	University graduate	BK UIN Ar-Raniry
3	Aceh	Mujiana	Head of Madrasah	MIN Lampupok Raya
4	Aceh	Salfayana Putri	University graduate	PGMI UIN Ar-Raniry
5	Aceh	Yulia Rahmi	Teacher	SDN 22 Banda Aceh
6	Aceh	Nilawati	Teacher	SDN 3 Kota Jantho
7	Aceh	Nurul Fadhilah	University student	PGSD FKIP Unsyiah
8	Aceh	Sri Puji Astutik	University student	BK UIN Ar-Raniry
9	North Sumatra	Hairani Sabrina	University graduate	UIN - SU
10	North Sumatra	Hariyani	Teacher	Mts Al wasliyah
11	North Sumatra	Muhammad Iqbal	Lecturer	UIN - SU
12	North Sumatra	Rilly Andika	Teacher	SMP Harapan Mandiri Medan
13	North Sumatra	Sri Hayuni	University graduate	UNIMED
14	North Sumatra	Suci Dahliya Narpila	Lecturer	Universitas Potensi Utama
15	North Sumatra	Syafiq Anshori Solin	University graduate	UNIMED
16	North Sumatra	Yanti Rambe	University graduate	UNIMED
17	Banten	Ferny Irawati	Teacher	SMP Rendhawa Cilegon
18	Banten	Widha Kurniasari	Teacher	Primagama Cilegon
19	Banten	Deden Mashudi	Teacher	MTs Al Ikhsan Cijawa Serang
20	Banten	Istiqomah	Teacher	MI Darul Mukaromah Cilegon
21	Banten	Faizah	Teacher	MI Nurul Hikmah Tangerang
22	Banten	Evy Septiani	Teacher	SMK Wipama Tangerang
23	Banten	Nur Arlina	Teacher	SMP IT La Royiba Serang
24	West Java	Rahmat Sutedi	Assistant Lecturer	UPI
25	West Java	Mashudi	Teacher	SDN 01 Klarapandak-Sukajaya-Bogor
26	West Java	Dici Rizka Anditia	Assistant Lecturer	UPI
27	West Java	lin Setyaningsih	Teacher	SD Nugraha-Kota Bandung
28	West Java	Novia Deviyanti	Teacher	SDN 1 Ujung Berung-Kota Bandung
29	West Java	Kamaludian Gumilar	Teacher	SDN Sukapura-Cianjur
30	West Java	Titi Setiawati	Lecturer	STKIP Sumedang
31	West Java	Mariah Ulfah	Assistant Lecturer	UPI
32	West Java	Nandi	Lecturer	UPI
33	West Java	Mela Darmayanti	Assistant Lecturer	UPI
34	Central Java	Desi Wulnadari	Lecturer	UNNES Semarang
35	Central Java	Nugraheti Srimulatsih	Lecturer	UNNES Semarang
36	Central Java	Agung Hastomo	Lecturer	UNY Yogyakarta
37	Central Java	Banu Setya Aji	Lecturer	UNY Yogyakarta

No	Province	Name	Position	Institution
38	Central Java	Silviana Nur Fauziah	University student	UIN Malang
39	Central Java	Arief Juang	University student	UNNES Semarang
40	Central Java	Moh. Sofyan	Lecturer	STAI MAFA Pati
41	Central Java	Moh. Sakur	University staff	UIN Walisongo Semarang
42	East Java	Mardiyanti	Teacher	SDN Panangungan Malang
43	East Java	Erika Mei Budiarti	University student	Universitas Negeri Malang
44	East Java	Khusnul Khotimah	University student	Universitas Negeri Malang
45	East Java	Ayu Hartini	University student	Universitas Negeri Surabaya
46	East Java	Alik Nadziroh	University student	Universitas Negeri Surabaya
47	East Java	Rahmat Afif Maulana	University student	Universitas Islam Negeri Sunan Ampel
48	South Sulawesi	Ridwan Idris	Lecturer	UIN Alauddin
49	South Sulawesi	Usman Pahar	Lecturer	UNM
50	South Sulawesi	Baharman	Lecturer	UNM
51	South Sulawesi	Hadrawi	University graduate	PGMI UIN Alauddin
52	South Sulawesi	Ilham Jafar	University graduate	PGSD UNM
53	South Sulawesi	Syamsuryani Eka Putri Atjo	Lecturer	PGSD UNM
54	South Sulawesi	Aris Armianto	University graduate	PGSD UNM
55	South Sulawesi	Misbahuddin	School principal	MI Darul Hikmah
56	South Sulawesi	Fitriani	University graduate	PGMI UIN Alauddin
57	South Sulawesi	Suciati	University graduate	PGSD UNM

Annex 4: Cohort 2 EGRA Implementation Schedule

No	Province	District	Date of assessment
1	Aceh	Aceh Utara	November 12-14, 2015
2	Aceh	Aceh Tamiang	November 16-17, 2015
3	Aceh	Pidie Jaya	November 23-24, 2015
4	Aceh	Aceh Barat Daya	November 26-27, 2015
5	North Sumatra	Langkat	November 10-12, 2015
6	North Sumatra	Toba Samosir	November 4-7, 2015
7	Banten	Tangerang	November 4-6, 2015
8	Banten	Tangerang Selatan	November 10-11, 2015
9	West Java	Kuningan	November 4-5, 2015
10	West Java	Cirebon	November 10-11, 2015
11	West Java	Bekasi	November 12-13, 2015
12	West Java	Tasikmalaya	November 18-19, 2015
13	Central Java	Wonosobo	November 10-12, 2015
14	Central Java	Pekalongan	November 17-18, 2015
15	East Java	Lumajang	November 4-7, 2015
16	East Java	Ngawi	November 9-12, 2015
17	South Sulawesi	Parepare	November 5-6, 2015
18	South Sulawesi	Takalar	November 18-19, 2015
19	South Sulawesi	Bone	November 23-24, 2015
20	South Sulawesi	Tana Toraja	November 26-28, 2015



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