

DATA MUST SPEAK

POSITIVE DEVIANCE RESEARCH IN LAO PDR



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POLICY BRIEF 1: INVESTING IN TEACHER CAPACITY – THE KEY TO EFFECTIVE LEARNING

Key findings

- **Teacher content knowledge and pedagogical skills are crucial for better school performance.** Teachers in highly effective schools score significantly higher on content knowledge than those in low or average effective schools.
- **Many primary school teachers have low levels of content knowledge.** Nonetheless, most school principals and teachers overestimate the performance of both teachers and students.
- **Teachers across all schools expressed a profound need for more professional development,** although marginally less in highly effective schools.
- **Promoting teacher collaboration is a key means to strengthening teacher capacity.** There is more teacher collaboration in highly effective schools than in the other schools.
- **Sustainable investments in the quality of primary education teachers are needed to improve student performance;** without this, children and young people in Lao PDR are unlikely to benefit from quality education and get equipped with knowledge and skills needed for further education and to thrive in Lao society.

Context

Lao PDR has made steady progress in expanding access to education in recent decades, yet many children still leave primary education without being able to read, write, or perform simple numerical calculations.^{1,2} Despite this learning crisis, some schools outperform others, even in the most disadvantaged areas. By identifying these “positive deviant” or “highly effective” schools and the “good practices” underlying their success, important lessons can be drawn.

Positive Deviance Research

The *Positive Deviance Research* investigates grassroot solutions to help improve the quality of education in the country. Based on key indicators such as student performance in language and mathematics, a sample of 120 schools was selected with even distribution of high (40), average (40), and low (40) effectiveness. School principals, teachers, students, Village Education Development Committee members, and District Education and Sports Bureau staff were surveyed.

Research findings

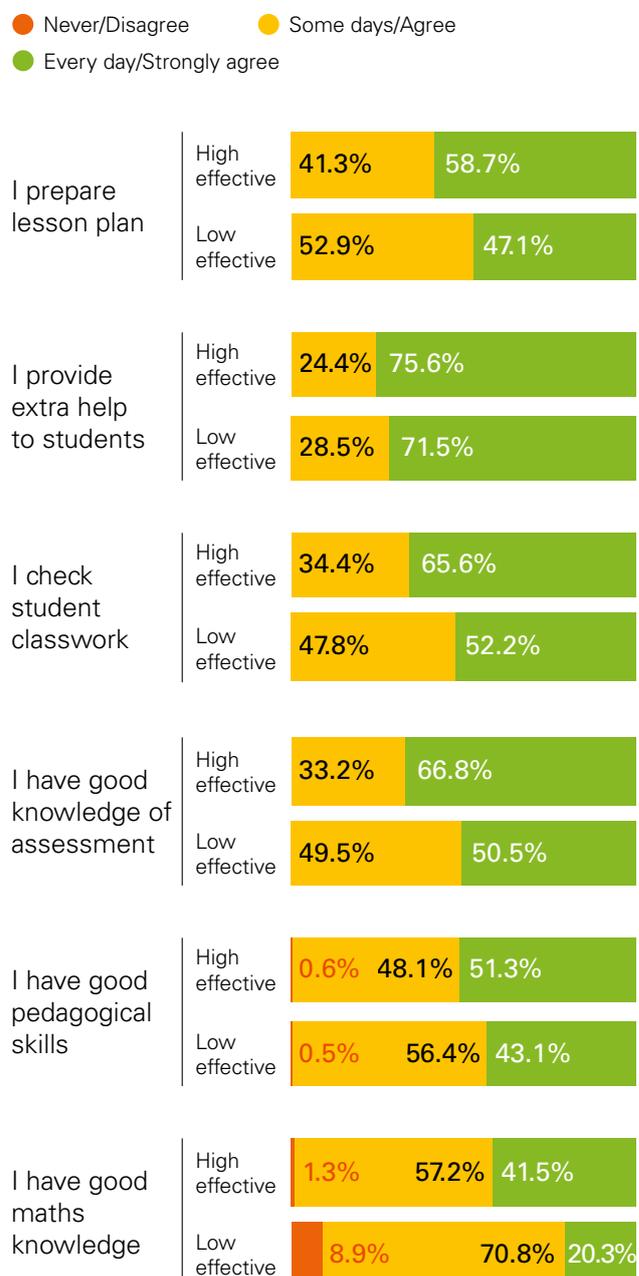
Teacher content knowledge and pedagogical skills are strong predictors of highly effective schools. In line with international research evidence, teacher capacity – defined by their content knowledge and pedagogical skills — is also a key predictor of student performance in Lao primary schools.³⁻⁶ Compared with teachers in low effective schools, they, for example, report more frequent preparation of lesson plans, checking of students’ classwork and homework, and reporting of student results to their parents (see *Figure 1*). Students and school principals generally corroborate these findings. Teachers in highly effective schools also report significantly higher levels of confidence in their pedagogical skills and content knowledge.

This study tested teachers’ content knowledge in the Lao language and mathematics. The results of these

assessments are consistent with teachers’ self-reported knowledge and skills capacity levels, and confirm that teachers in highly effective schools have significantly higher levels of content knowledge. The analysis showed that teacher capacity is closely linked to average student achievement, highlighting its importance as a predictor of school effectiveness (see *Figure 2*).

Figure 1. Teachers' self-reported practices, behaviours, and skills

Sample size: High effective school teachers (n=120), low effective school teachers (n=119)

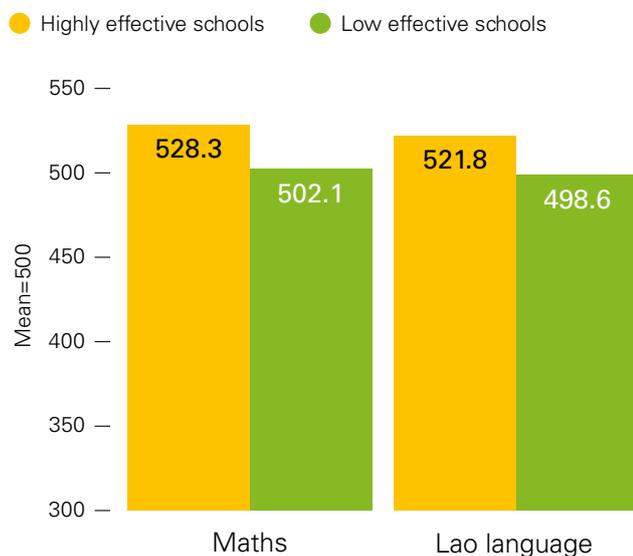


Low teacher capacity. This study also found that teacher content knowledge is low across all types of schools in Lao PDR. Roughly half of the teachers scored less than 50 per cent in the assessment in the Lao language and mathematics content knowledge. None of the teachers were able to answer all questions correctly. These findings confirm the results of an earlier study conducted in 200 primary schools.⁷

Overestimation of teacher capacity. Most school principals including those in average and low effective schools rate their teachers' capacity very positively. In particular, principals are very positive about their teachers' Lao language knowledge: about 90 per cent strongly agreed that they have good Lao language skills. These perceptions are at odds with the generally poor content knowledge and pedagogical skills of many primary education teachers and the low student performance in many schools across the country.^{8,9}

Figure 2. Teachers' scores in Lao and maths assessment

Sample size: High effective school teachers (n=115), low effective school teachers (n=113)



High need for teacher professional development across all schools. Teachers were asked if they required more training in a range of teaching, assessment, and classroom management practices. The average teacher responded in the affirmative in nearly 90 per cent of the practices, although marginally fewer teachers in highly effective schools asked for further training. Professional development

of teachers in Lao PDR has often been implemented through one-off, large-scale training initiatives (e.g., workshops). Therefore, when teachers reported they needed further training, this was likely what many had in mind. Research evidence shows that such a training approach often fails to deliver the desired results, as it is often expensive, thus raising further challenges given the tight budget situation the education sector is facing.

Promoting teacher collaboration to develop teacher capacity. This study, as well as international research evidence,¹⁰⁻¹² points to the partially untapped potential of promoting collaboration between teachers as a key means for developing their capacity.

This study showed that school principals in highly effective schools reported higher levels of collaboration and engagement with teachers than their peers in low effective schools. For instance, 42 per cent of principals in highly effective schools reported that they "Often" observe teachers, compared with only 20 per cent of low effective school principals.

The bottom line

Teacher content knowledge and pedagogical skills are (as expected) higher in highly effective schools. That said, teacher content knowledge is low in many schools. School principals and teachers overestimate teachers' capacity, but at the same time, teachers do recognize the need for further professional development. Beyond traditional teacher training, promoting collaboration and peer learning between teachers is an important way to do so.

This study adds to the growing evidence base that supports the Lao PDR Education and Sports Sector Development Plan 2021-25 policy objective of prioritizing investments to improve capacity of primary teachers. Recognizing the current teacher capacity levels, this study calls for a significant increase in the non-wage recurrent budget; without this, children and young people in Lao PDR are unlikely to reap the benefits of quality education and get equipped with the knowledge and skills needed for further education and to thrive in Lao society.

About Data Must Speak (DMS) Positive Deviance Research

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fund) and UNICEF Lao PDR's efforts (under the EU-funded Partnership for Strengthening the Education System) in Lao PDR. The aim is to enhance the capacity of the Ministry of Education and Sports in data management and utilization for monitoring and planning. This research is part of the multi-year DMS Positive Deviance programme led by the UNICEF Office of Research – Innocenti involving 13 other countries across Africa, Asia, and Latin America.

Endnotes

1. UNICEF and SEAMEO, *SEA-PLM 2019 Main Regional Report: Children's learning in 6 Southeast Asian countries*, Bangkok, Thailand: UNICEF and SEAMEO, 2020.
2. World Bank, *Lao PDR – SABER Service Delivery 2018, Measuring Education Service*. World Bank, 2019.
3. Blömeke, S. and S. Delaney, *Assessment of Teacher Knowledge Across Countries: A review of the state of research*. ZDM Mathematics Education, vol. 44, 2012, pp. 223–247.
4. Chetty, Raj, J. N. Friedman and J. E. Rockoff, *Measuring the Impacts of Teachers I: Evaluating bias in teacher value-added estimates*, The American Economic Review, vol. 104, no. 9, 2014, pp. 2593–2632.
5. Rivkin, S. G., E. A. Hanushek and J. F. Kain, *Teachers, Schools and Academic Achievement*, Econometrica, vol. 73, 2004, pp. 417–458.
6. Wayne, A. J. and P. Youngs, *Teacher Characteristics and Student Achievement Gains: A review*, Review of Educational Research, vol. 73, 2003, pp. 89–122.
7. World Bank, *Lao PDR – SABER Service Delivery 2018, Measuring Education Service*, World Bank, 2008.
8. UNICEF and SEAMEO, *SEA-PLM 2019 Main Regional Report: Children's learning in 6 Southeast Asian countries*, Bangkok, Thailand: UNICEF and SEAMEO, 2020.
9. World Bank, *Lao PDR - SABER Service Delivery 2018, Measuring Education Service*, World Bank, 2018.
10. Education Commission, *Transforming the Education Workforce: Learning teams for a learning generation*, Education Commission, 2019.
11. Fullan, M., S. Rincón-Gallardo and A. Hargreaves, *Professional Capital as Accountability*, Education Policy Analysis Archives, vol. 23, no. 15, 2015, pp. 1–18.
12. Schleicher, A., *World Class: How to build a 21st-century school system*, Paris: OECD Publishing, 2018.

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