

Helping teachers to improve children's oral language and literacy skills



Key points

- To provide children with the best opportunity to get the most out of learning, we need to improve their oral language skills in the early years of schooling.
- Improving teacher effectiveness is an important step in lifting oral language and literacy outcomes for children.
- The CPOL whole-of-classroom professional learning program was effective at improving teacher knowledge of oral language in the short-to-medium term.
- Teacher oral language knowledge is amenable to change with specifically-designed professional learning.
- Improved teacher knowledge alone does not necessarily lead to improved teacher practice and student outcomes; retention of knowledge over time and implementation of practice change in the classroom is challenging.

Background

Children's ability to communicate and use language affects their access and participation in education. Strong communication and language skills enable children to learn and lay a foundation for mental health, behaviour and life opportunities¹.

In the early years of schooling, oral language competence is of particular importance because it underpins the emergence and ongoing development of reading, and broader literacy skills².

Evidence indicates that by the time children start school, differences in oral language skills are already apparent and children from lower socio-economic backgrounds are more likely to begin school behind their peers in oral language³.

Intervening early provides the best opportunity to make a difference to children's education and life opportunities⁴. To improve children's educational outcomes, interventions must explicitly address oral language skills.

While teaching quality is essential for improving children's oral language skills⁵ – particularly for children from lower-socio-economic backgrounds – few studies have explored the types of professional learning that build teacher capacity for improving children's oral language when implemented on a large scale.

Aim

The Classroom Promotion of Oral Language (CPOL) trial aimed to test whether a professional learning program focused on a whole-of-class approach to promoting oral language could build teacher capacity in oral language and improve children's language, literacy, and mental health outcomes.

Study details

The CPOL trial was conducted in collaboration with Victorian Department of Education and Training and Catholic Education Commission of Victoria schools across Victoria, Australia.

Identifying what works

Randomised controlled trials (RCTs) are the most scientifically rigorous method for testing the effectiveness of an intervention. RCTs randomly assign participants to an intervention or control group, and compare the outcomes of the two groups. Much of the previous research in this area uses a pre-post design without a control group to examine the impact of teacher professional learning. This is problematic since it is impossible to say whether the intervention is the cause of the improvement (rather than natural development over time, for example). RCTs can be challenging to conduct as they need to be meticulously planned and implemented, however they can provide robust and high quality evidence about what works in different settings.

Changing the learning trajectory for children

The goal was to influence the learning and health trajectory of children starting school developmentally behind their peers in oral language. Participating schools needed to meet an eligibility criteria of having greater than 10 per cent of children developmentally vulnerable in the language and cognitive domains of the 2009 and/or the 2012 Australian Early Development Index – now the Australian Early Development Census (AEDC). The AEDC is a population measure of early childhood development completed by teachers on all children starting school in Australia in 2009, 2012 and 2015⁶.

The research process

The CPOL RCT was successfully implemented in seventy-two schools over five-years from 2013-2017. Thirty-six schools were randomised to the intervention group and thirty-six schools to the control group. One foundation class within each participating school was selected as the 'index class', and data were only collected from teachers and students within these classes. There were 1360 students (687 in the intervention group and 673 in the control group) and 78 teachers participating in the trial. Schools in the control group conducted teaching as usual in the classroom.

The CPOL intervention

The CPOL intervention used a whole-of-classroom approach to improve teacher knowledge and change teacher practice in oral language. This included: (1) face-to-face professional learning, (2) an online self-directed learning network, and (3) CPOL implementation support coaches.

Face-to-face professional learning days

All teachers (not just the index class teacher) from schools in the intervention group were invited to attend four days of face-to-face professional learning delivered by language and literacy experts. The professional learning days focused on the link between early oral language competence and the emergence of linguistic skills important for the transition to literacy (e.g. vocabulary, comprehension, and phonemic awareness).

The intervention was informed by the Ideas, Conventions, Purposes, Ability to Learn, Expressive and Receptive Language Framework (ICPALER). This framework considers the underlying expressive (talking) and receptive (understanding) language skills that a student has mastered and helps teachers promote language development in their classroom⁷. Teachers were supported to implement strategies that help students to develop more sophisticated language skills.

Online self-directed learning network

The online self-directed learning network of teachers created a community-based approach to changing teacher practice.

The provision of CPOL implementation support coaches

To help teachers to implement and maintain oral language strategies in their classrooms, CPOL support coaches were appointed to provide intermittent face-to-face, telephone and online contact. This aimed to ensure that questions were addressed and teachers were supported by modelling and coaching.

Measures used to understand how the intervention benefits children

The primary outcome measure was student reading ability at grade 3.

Other student outcomes measured were:

- mental health (end of grade 1)
- reading comprehension (end of grade 1)
- expressive and receptive language ability (end of grade 1)
- writing, language conventions, and numeracy ability (grade 3)

The teacher outcomes measured were:

- knowledge of language and literacy concepts
- classroom practice

Key findings

Teacher knowledge

Teacher knowledge was significantly greater for teachers in the intervention group following their participation in the professional learning, compared to the control group. This was especially the case in the areas most related to the content of professional learning intervention (i.e. knowledge about the internal structure of words (morphology), identifying and manipulating sounds in words (phonemic awareness) and the way sentences are arranged grammatically and used in context (sentence structure and discourse)).

Teachers in the intervention group continued to perform better than the control group on a test of language and literacy constructs 12 months later, however this difference was no longer statistically significant.

Teacher practice

Overall change in teacher instructional practice following the CPOL intervention was measured by examining the type and function of teacher talk used in classrooms. The types of teacher talk measured included:

- organisation (classroom management and literacy management)
- doing literacy (reconstruction/restatement, elaboration/projection and informative)
- learning about literacy (process and utility).

Findings suggested there were no significant differences in classroom teacher talk between usual teacher practice and the teachers in the intervention arm who participated in the CPOL professional learning days.

Student oral language skills

There was no evidence of a difference in any of the student oral language and literacy measures between children in the intervention and control groups of the trial.

Implications

In Australia and internationally, there is strong interest in rigorous testing of professional learning interventions for teachers⁵. Given the lack of evidence in this area to date, the CPOL trial provides important insights into the ‘real world’ challenge of implementing change in teachers’ knowledge and their classroom practice.

The CPOL intervention was successful in changing teachers’ knowledge in the short-term, suggesting the CPOL professional learning had an effect. CPOL was not effective at changing teacher talk in the classroom, or advancing student language at end of grade 1 or oral language and literacy at grade 3.

It is clear that implementation and process outcomes that can determine ‘what works’ for whom, under what conditions, and in what circumstances, are necessary for sustainable success.

A real and sustained focus on implementation of evidence-informed approaches to oral language in the context of building oral language competencies is needed. However, a focus across the school ecosystem including all teachers, literacy leaders and principals is needed in order to drive system change.

There is a large percentage of Australian students failing to achieve the reading skills necessary for life after school⁸. To address this challenging problem, rigorous ongoing evaluation of how schools can deliver an intervention at scale, effectively and equitably, continues to be important. Future research would benefit from evaluating the factors that affect implementation.

For further information

Details of the research papers

Study protocol

Goldfeld, S., Snow, P., Eadie, P., Munro, J., Gold, L., Le, H.N.D., Orsini, F., Shingles, B., Lee, K., Connell, J. & Watts, A. (2017). Classroom Promotion of Oral Language (CPOL): protocol for a cluster randomised controlled trial of a school-based intervention to improve children’s literacy outcomes at grade 3, oral language and mental health. *BMJ Open*, 7:e016574. doi:10.1136/bmjopen-2017-016574.

Other research papers

Goldfeld, S., Snow, P., Eadie, P., Munro, J., Gold, L., Orsini, F., Connell, J., Stark, H., Watts, A., & Shingles, B. (2020). Teacher knowledge of oral language and literacy constructs: results of a randomized controlled trial evaluating the effectiveness of a professional learning intervention. *Scientific Studies of Reading*. doi:10.1080/10888438.2020.1714629

Stark, H.L., Eadie, P.C., Snow, P.A., & Goldfeld, S.R. (2019). The impact of a sustained oral language professional learning program on Australian early years' teachers' knowledge, practice and beliefs: a mixed-methods exploration. *Professional Development in Education*. doi:10.1080/19415257.2019.1603170

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Snow, P. C., Eadie, P. A., Connell, J., Dalheim, B., McCusker, H. J., & Munro, J. K. (2014). Oral language supports early literacy: A pilot cluster randomized trial in disadvantaged schools. *International Journal of Speech-Language Pathology*, 16(5), 495-506. doi:10.3109/17549507.2013.845691

About the Classroom Promotion of Oral Language project

This research was a collaboration bringing together leading health and education researchers from Murdoch Children's Research Institute, the University of Melbourne, La Trobe University, Deakin University, and the Royal Children's Hospital Education Institute. We worked in partnership with education sectors; the Victorian Department of Education and Training and the Catholic Education Commission of Victoria.

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References

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- 3 Law, J., McBean, K. & Rush, R. (2011). Communication skills in a population of primary school-aged children raised in an area of pronounced social disadvantage. *International Journal of Language and Communication Disorders*, 46(6), 657-664. doi:10.1111/j.1460-6984.2011.00036.x
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- 7 Munro, J. (2011). *Teaching oral language: building a firm foundation using ICPALER in the early primary years*. Melbourne, Australia: ACER Press.
- 8 Australian Curriculum, Assessment and Reporting Authority (ACARA). (2017). *NAPLAN Achievement in Reading, Writing, Language Conventions and Numeracy: National Report for 2017*. Sydney: ACARA.