

Teacher Professional Learning in Grade-Level Teams

Implementation and Impact During the COVID-19 Pandemic



Teacher Professional Learning in Grade-Level Teams

For achievement and other student outcomes, research underscores the importance of teachers. But how can we improve teacher effectiveness? Among the most widely used approaches is to implement teacher professional learning programs—programs designed to train teachers who are already in the teacher workforce.

In 2018, the American Institutes for Research® (AIR®) and its partners began a project that leverages prior studies of teacher effectiveness. Specifically, three prior studies found positive impacts on student achievement from observing teachers and giving them ratings-based feedback using a multidimensional rubric called The Danielson Group's Framework for Teaching (FFT). School districts routinely use the FFT as a teacher evaluation tool for rating teachers and giving feedback.

To find additional ways to engage teachers in learning activities that center on the FFT, the project developed and tested a teacher professional learning program called Professional Learning with Impact (PLI). The program providers, The Danielson Group and Learning Forward, developed, piloted, and improved the PLI program, and then AIR launched the project's impact study in summer 2021.



Professional Learning for Impact (PLI) Program Components

Developed by The Danielson Group and Learning Forward, PLI is based on the FFT and includes the following components:

- 15** Fifteen hours of workshops led by the program providers in the first year
- 24** Twenty-four learning team meetings per year focused on collaborative inquiry cycles led by a trained district coach
- 2** Two rounds of individual instructional coaching per year, each consisting of a planning meeting, two or more video debriefs, and a reflection meeting



AIR's Evaluation of the Implementation and Impact of the PLI Program

AIR partnered with a sample of school districts and schools randomly assigned to treatment or control. The study team expected treatment schools to implement the PLI program for 2 years, while the control schools continued with business as usual.

All study schools were elementary schools serving high proportions of students with high needs. Each school was required to have three or more teachers in the focal grade, which was either Grade 4 or 5.

Limitations

- The impact evaluation overlapped with the COVID-19 pandemic, which made partnering with districts and schools difficult.
- Achievement data were available for nearly all students in the study, but many teachers left study schools during the 2-year study period. The loss of teachers made observing effects of the PLI program more difficult and increased the chances that results are relevant only to the type of teachers who persisted across the entire study.



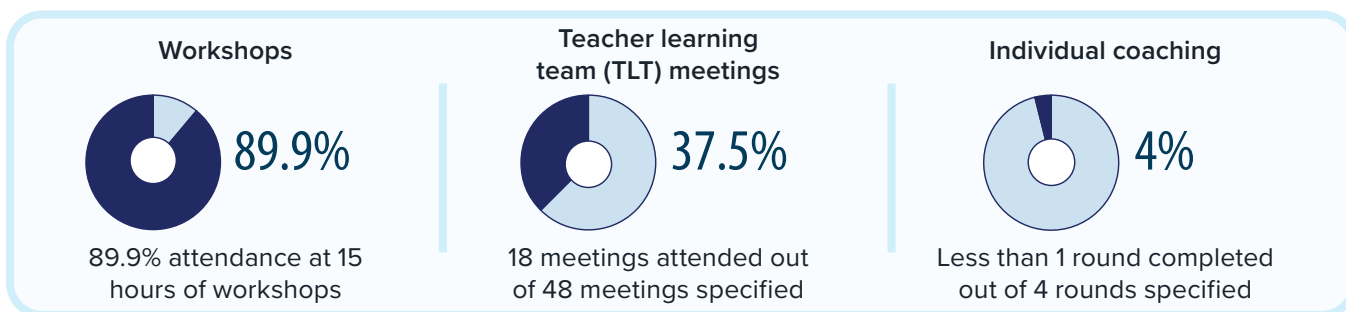
The PLI Program and Its Implementation

The PLI program providers train, monitor, and support local coaches who facilitate the two core activities—teacher learning teams (TLTs) and individual coaching—for teachers in the focal grade. Each activity uses the FFT to help teachers think about the quality of instruction. The activities focus on goals for student outcomes that TLT members set during their meetings.

The providers also worked directly with study teachers through three workshops totaling 15 hours, all of which are designed to occur during the first year. The first workshop orients teachers to the program, and the fall and spring workshops provide ongoing support.

Study schools were expected to implement the PLI program for 2 years. Based on the study's implementation data, the treatment teachers completed some of the PLI program activities, most notably the workshops and several TLT meetings. Participation in the individual coaching as designed was very low (see Exhibit 1).

Exhibit 1. Key Findings About Implementation



The Impact of the PLI Program as Implemented

To evaluate impact, AIR examined student and teacher outcomes after 2 years (i.e., in spring 2023). The program had no statistically significant impacts on teacher outcomes but did have some impact on student outcomes.



Impact on Teachers. The impact analyses found no statistically significant impacts on either primary teacher outcome—self-efficacy or classroom practice.

Impact on Students. The impact on mathematics achievement was positive but not statistically significant ($ES = 0.05$; $p = .319$). The impact on English language arts (ELA) achievement was positive and statistically significant ($ES = 0.09$; $p = .031$).

Using the What Works Clearinghouse guidance on computing an improvement index, the ELA achievement effect size suggests that assigning a student scoring at the median from a control school to a school that uses the PLI program would increase that student's percentile rank in fourth-grade ELA achievement from the 50th percentile to the 54th percentile.

Effects were particularly strong for English learners, a group with average baseline scores well below the median and likely the most potential for improvement in ELA scores. The fact that many TLTs set goals related to ELA could help explain this result.



Can the PLI Program Be Scaled Up?

For districts trying to improve student achievement, the impact evidence suggests that two of the PLI program components centered on the FFT—the workshops and the TLTs—are worth implementing. The other component—individual coaching—was barely implemented in the way it was designed, so the study could not assess the effectiveness of this PLI program component.

The TLTs met well under half as often as specified by the program (an average of 18 times rather than 48 times throughout 2 years), yet the TLTs had a positive impact on student achievement. The lower frequency of TLT meetings may indicate that the original plan for 48 meetings (24 meetings per year) was unrealistic. Reducing the recommended frequency of the TLT meetings, or allowing schools to set the number as low as 18 meetings, would give schools a way to “right size” the program and still achieve benefits.

Resources

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