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Sustainability of achievement outcomes following early literacy interventions

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Background

This paper reports on stage one of research project examining whether literacy achievement outcomes are sustained following an early intensive intervention. Pedagogical conditions that support sustainability. Reading Recovery, as an instance of an early literacy intervention, are to be investigated

New Zealand has a number of early literacy interventions to support students' achievement of literacy to appropriate levels. Many studies report short term benefits for most students for diverse students and in a range of contexts (e.g McDowall, Boyd & Hogden, 2005). Others demonstrate that school wide professional development of teachers, based on research informed practices, can lead to raised student achievement in literacy over several years (e.g. Lai, McNaughton, Amituanai-Toloa Turner & Hsaio, 2009,). However, despite the success of such interventions persistent underachievement in literacy is evident, nationally and internationally (Chamberlain, 2008; Mullis, Martin, Kennedy & Foy et al 2006;). The question arises are early literacy intervention outcomes sustained over time.

Hiebert and Taylor (2000) in a review of early interventions in the US concluded that a proportion of students are still not reading sufficiently well after participating in an early reading intervention in year three or beyond. They argued that teacher development is essential for gains if learning is to be sustained. Characteristics of interventions that demonstrate long term effects have been reported in a number of studies.(e.g Pilkuski, 1994) but little research has examined how best to ensure that gains made during an intervention are sustained.

There is little evidence, much of it conflicting, to indicate whether academic gains from interventions such as Reading Recovery are sustained following transition back into the full classroom environment. A number of national and international studies provide evidence for long term positive effects (for example: Askew, Kaye, Frasier, Mobasher, Anderson, & Rodriguez, 2002; Rowe, 1995;). Others, (e.g. Chapman, Greaney, Tunmer , 2007), provide evidence to the contrary.

For Reading Recovery, as an instance of a systemic early intervention in New Zealand it is hypothesized that sustainability of outcomes is dependent on the quality of the articulation between Reading Recovery teachers, classroom teachers, and school leaders during the programme and particularly after discontinuation.

Research Questions

The overall aim for the project is to ensure that literacy outcomes, achieved by students in early intensive interventions, are sustained in regular classroom literacy programmes. The projects investigates the context around the transition from intensive support of Reading Recovery, as an example of a intensive early literacy intervention, to the classroom context. The project aims to develop knowledge about literacy learning practices that are required

The specific questions reported on in this paper are

- What evidence is there in the research literature that students who had an intensive early literacy intervention sustained achievement gains? What pedagogical conditions can be identified as associated with sustained achievement?

- To what extent have students in New Zealand, previously successfully discontinued from Reading Recovery, sustained progress so that literacy achievement is commensurate with the expectations for their cohort.

Methods

As noted above this paper reports on the first stage of a longer project.

Stage 1 consists of two components:

1. An extensive review of the literature on early literacy intervention achievement, including Reading Recovery, outcomes.
2. Collection and analysis of literacy achievement of students who have been successfully discontinued from Reading Recovery within the past four years to establish achievement levels relative to expectations for their age cohort on standardized tests.

1. A Review of the Literature:

The first stage of the project is currently underway. An extensive review of over two hundred research reports has been undertaken and analyses and synthesis will be completed over the next couple of months

2 Literacy achievement data

Data on student achievement is being collected during Semester 1 of 2010, that is during March to May.

Participants

The sample consists of students in years four, five and six in the participating schools who were successfully discontinued from Reading Recovery in year two.

Data collection

- STAR (Supplementary Tests of Achievement in Reading- to ascertain stanine levels of participating students for vocabulary knowledge, word recognition, and comprehension.
- asTTle -Writing (Assessment Tools for Teaching and Learning) to determine writing achievement in relation to New Zealand norms for participating students in years four, five and six .

Frame

The literature on literacy achievement following an intensive early literacy intervention is being analysed through a theoretical framework that sees literacy learning within a socio-cultural and constructivist framework. Literacy achievement is the result of interactions between the classroom environment, prior experiences including Reading Recovery intervention programme and intrinsic elements that the student brings to the learning context. Clay (2001) argued that children discontinued from the Reading Recovery Programme, (or indeed any intensive intervention), require careful monitoring for two to three years after individual tutoring has ended, and that "the classroom instruction subsequent to Reading Recovery is critical for children's subsequent progress" (p.263). The research literature is being interrogated to determine features of pedagogical instructional environments in which sustained achievement has been demonstrated.

Research findings

It is expected full analysis of the literature will provide insights into pedagogical and environmental conditions that appear to contribute to sustained literacy achievement following an intensive literacy interventions. Achievement data from New Zealand students will provide evidence as to whether initial gains from Reading Recovery have been sustained. Outcomes may also enhance Reading Recovery outcomes to ensure that investment in intensive early literacy development are maximized.

Reducing the inequities in literacy outcomes is a high priority. Thus this project's key aim is to contribute to knowledge on how best to sustain progress for low achieving students who have had an early literacy intervention.

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