





Received: 19 October 2015 Accepted: 03 November 2015 Published: 10 December 2015

*Corresponding author: Ken Edge, NSW Department of Education, Miller Technology High School, Cabramatta Avenue, Miller, New South Wales 2168, Australia

E-mail: kenneth.edge@det.nsw.edu.au

Reviewing editor: Mark Boylan, Sheffield Hallam University, UK

Additional information is available at the end of the article

TEACHER EDUCATION & DEVELOPMENT | RESEARCH ARTICLE

Contextual complexity: The professional learning experiences of seven classroom teachers when engaged in "quality teaching"

Ken Edge^{1*}, Ruth Reynolds² and Mitch O'Toole³

Abstract: This research study interrogates the self-reported perceptions of seven experienced Human Society and Its Environment (HSIE) teachers about the professional learning influencing their classroom teaching after being involved in a number of initiatives to improve their teaching in New South Wales (Australia). The results indicated that the teachers' professional learning experiences, ways of thinking about professional learning and responses to implementation of new approaches to professional learning were dominated by traditional training models even while operating under a new state-wide professional learning model (Quality Teaching) approach. While the teachers acknowledged the value of reflective practice, collaborative networking and teaming, they found that difficulties in implementing these strategies within faculties and across schools lessened their impact. It was apparent that local institutional history, context and politics had an enormous impact on the success of the professional learning programme. The findings of this study are significant because leadership aimed at acknowledging and addressing the teaching context at the school level is a critical factor if we are to develop twenty-firstcentury teachers.

ABOUT THE AUTHORS

The findings reported are part of the first author's PhD research confirmed in November 2012. When the research was conducted, the first author was the head teacher in the Human Society and Its Environment (HSIE) Key Learning Area in a New South Wales public secondary school. This was a time of pedagogical change with the introduction of the NSW Quality Teaching model by the NSW Department of Education and Training.

The initial research involved a classroom observation study. In examining influences on the teaching observed, collaborative interviews were held. Interpretations were made with teacher professional learning found to be a key explanatory factor.

The co-authors of this article were my PhD supervisors. Their research interests involve twenty-first-century pedagogy or global pedagogy in Indonesia, China and Singapore. This research forms part of a wider application of the New South Wales Quality Teaching, including work on alignment in the Philippines.

PUBLIC INTEREST STATEMENT

This study explores teachers' perceptions of professional development, learning and change. The study builds on previous research in the area of "teacher change" by providing powerful insights into why these HSIE teachers taught the way they did.

The findings indicate that the teachers had experience with many different patterns of professional learning. They seemed to realise that traditional patterns of "in-service" were not particularly effective, while engagement in both collaborative and individual reflection could encourage them to cast a critical eye on their own teaching practices.

The findings also provide insights into what these teachers wanted from their educational leaders in supporting professional learning and change. However, with an expert teacher perspective, the nature of the sample needs to be considered in interpreting other school contexts.









Subjects: Educational Change & School Reform; Secondary Education; Teaching Practice - Education

Keywords: professional learning; professional development; quality teaching; teacher quality; teacher change

1. Introduction

The research base involving teacher professional learning is large and this study builds on and contributes to research on professional learning as part of a broader understanding of teacher change (Chin & Benne, 1976; Clarke & Hollingsworth, 2002; Guskey, 1986; Knight, 2002; Richardson & Placier, 2001). Many case studies of professional learning seek patterns of good practice and internationally there have been lists developed of good practice models for twenty-first-century teacher professional learning (Achinstein, Ogawa, & Speiglman, 2004; Australian Institute for Teaching and School Leadership [AITSL], 2012; Borko, 2004; Darling-Hammond, Wei, Andree, Richardson, & Orphanos, 2009; Fraser, Kennedy, Reid, & McKinney, 2007; Kennedy, 2005; OECD, 2005). However, there have been few studies utilising "best practice" professional learning models to ascertain why predictable and purposive teacher change remains elusive and even fewer acknowledging teacher views on why this may be so.

This study analyses Human Society and Its Environment (HSIE) teachers' interpretations and reflections on "best practice" professional learning with the introduction of the New South Wales Department of Education & Training Quality Teaching model (NSWQTM) (New South Wales Department of Education & Training, 2003). We addressed this issue by interrogating interviews undertaken with experienced teachers after written and verbal observation feedback was given to each of them by the researcher (Edge, 2012a, 2012b) on classroom observations (n = 61) of a number of lessons taught (minimum 5, maximum 10) and conversations held about what influenced their individual teaching practices. In understanding the nature of best practice professional learning, the NSWQTM provided an indicator of good teaching and was supported by the Australian Government Quality Teaching Program (Australian Government Department of Education Employment and Workplace Relations [DEEWR], n.d.; Commonwealth of Australia, 2003, 2005). The rating scheme applied to lessons observed within the model and professional learning developed was based on what was seen as "state-of-the-art" approaches such as "collaborative networking" and "action cycles of learning" and "relearning". As such, this study provided insight into factors that influence professional learning after feedback on classroom teaching practice.

Although numerous studies on professional learning have identified challenges to teachers' professional learning, little analytic attention has been paid to scrutinising teachers' views on these practice. It would seem from the results of our study, professional learning is much more than the application of a good model—it is a way of thinking about the value of education and some agreement among teachers about how to achieve a valued educational experience. One way to influence the development in the schools and, in turn, positively influence the learning outcomes of students is by educational leadership effectively supporting and managing teacher professional learning (Cardno, 2005).

2. Teacher professional learning in the twenty-first-century

Twenty-first-century teachers and school leaders are asked to transform educational outcomes to personalise learning experiences to ensure that every student has a chance to succeed and to deal with increasing diversity in culture and learning styles in their classrooms (Grundy & Robison, 2004; Hardy, 2008; Sugrue, 2004). This often requires innovations in curricula and pedagogy, particularly in the application of digital resources, and implies a strong focus on teacher ongoing professional learning and continual professional growth. However, research into teacher change, although providing some evidence of success (Dinham, 2007b; Gore & Ladwig, 2006), also provides stories of failure and sustainable change appears to remain largely elusive (Hargreaves & Fullan, 1998; Hargreaves & Goodson, 2006). While it has become increasingly evident that the quality of teaching

makes a difference to student outcomes (Connell, 2009; Hattie, 2003; Johnson, 2012a, 2012b; McCaffrey, Koretz, Lockwood, & Hamilton, 2004; OECD, 2005), professional learning for improved classroom teaching skills and improved student outcomes appears to be less than straightforward. As Darling-Hammond et al. (2009) points out, professional learning can make a difference to student learning outcomes, but this well-developed professional learning is not easy to achieve; "teachers lack time and opportunities to view each other's classrooms, learn from mentors, and work collaboratively. The support and training they receive is episodic, myopic, and often meaningless (p. 2)".

In understanding the principles of high-quality professional learning, Achinstein et al. (2004) reported that there appeared to be, in fact, two different styles of professional learning, one which appeared to emphasise scripted lessons and mentorship in applying these and one which emphasised a teacher as a professional approach, giving them a wider freedom of application of classroom strategies. They argued that there was a danger that strong accountability and more carefully scripted approaches to professional learning could lead to lower cultural capital and a loss of professionalism by teachers and suggested that the reasons why one, as opposed to the other, of these two approaches emerged were due to a mixture of teacher background, district and school conditions and state policies.

Continued discussion seems to revolve around "old" professional learning and the "new" approach. "Old" professional learning comprises of one of the workshops usually held away from the teaching site where an expert arrives to tell the teacher how to teach (Hoban, 2002; Kelly & McDiarmid, 2002; Richardson & Placier, 2001; Stein, Smith, & Silver, 1999; Zeichner, 2003). The "new" approach is about reflecting and building collaborative teams of practice, the antithesis of the above (Darling-Hammond et al., 2009; Grushka, Hinde-McLeod, & Reynolds, 2005; Mooney Simmie, 2007; Trotman, 2009). It thus implies that "good" professional learning is ongoing, meaningful and relevant for the long term, giving local teachers time to view each other's classrooms and encouraging them to network and to form part of a collaborative mentoring (Doeck, Parr, & North, 2008; Fraser et al., 2007; Kennedy, 2005; O'Brien, Varga-Atkins, Burton, Campbell, & Qualter, 2008; Varga-Atkins, Qualter, & O'Brien, 2009).

However, Darling-Hammond et al. (2009) argued that professional development should align with school improvement priorities and goals, focus on student learning and address the teaching of specific curriculum content. Johnson (2012a) has a future-focused approach, claiming that schools need to invest in teachers' potential for growth, to build instructional capacity. Given these understandings, it would seem that educational authority will provide a direction for learning, but it would be developed through collaborative models. We found it interesting that these notions of professional learning continue to fit within a quite "old" schema of approaches to teacher change, that of Chin and Benne (1976).

Chin and Benne's schema identifies three different approaches to planned change, these being empirical-rational, normative-re-educative and power-coercive forms. Embodied within the empirical-rational strategy is the training or traditional model incorporating one of the courses that has arguably been the most dominant form of professional learning for teachers over the years, both in Australia and internationally (Hoban, 2002). The belief that underpins this approach is that teachers' knowledge and skills are accumulated in a linear, step-by-step manner over time (Richardson & Placier, 2001). The alternative normative-re-educative approach involves activities that allow teachers to exercise more autonomy through cultivating their own professional growth and determine the direction of change (Richardson & Placier, 2001; Warrican, 2006). These strategies form around Communities of Practice (CP) and involve a sociocultural perspective on professional learning (Cole & Engestrom, 1993; Lave & Wenger, 1991; Louis, Kruse, & Marks, 1996; Louis, Marks, & Kruse, 1996; Putnam & Borko, 2000). Chin and Benne's schema also acknowledged the political and economic mechanisms involved in the power-coercive approaches to instigate change (Richardson & Placier, 2001; Warrican, 2006), where direct financial incentives or bureaucratic oversight is the primary teacher motivator.

Some of the current measures to establish standards for student achievement, teacher performance and teacher professional learning have many features of the power-coercive approaches. These measures are more subtle in that only particular forms of professional learning will be encouraged and so even though teachers may be expected to work within collaborative frameworks, they do not have the luxury of deciding the focus of their learning. Some guidance as to the possible outcomes that could be achieved by comparing normative-re-educative approaches with powercoercive approaches is provided by a study comparing school self-evaluation programmes in Ireland and Iceland (McNamara, O'Hara, Lisi, & Davidsdottir, 2011). The Icelandic researchers argued that the democratic approach and independent nature of schools and teachers allowed for more collaborative, inclusive and valid approaches in developing evidence-based self-evaluation processes over time. On the other hand, the Irish experienced "top-down" reform and accountability with scrutiny by an autonomous and powerful external inspectorate body that reduced the school and teacher ownership of the process. The Irish experience represents the somewhat complex current orthodoxy regarding school change: practice changes before beliefs; it is better to think big but start small; evolutionary planning works better than linear planning; the most effective change strategies are "top-down" and combine both pressure and support (Hargreaves & Goodson, 2006). Such approaches allow little room for contextual complexity, for adjusting programmes to take into account the history of the school and its teachers, little room to allow the principal and the school leadership to enable, rather than, to enforce.

To further investigate aspects of teacher professional learning, the research question that guides this study is: How did experienced teachers' perceptions of professional learning influence their response to implementation of a centrally mandated model of quality practice? What follows, is the research design and data collection methods.

3. Studying the professional learning experiences of seven classroom teachers

This research examines the self-reported professional learning experiences of seven highly experienced junior secondary school teachers over the course of their careers and the change experiences associated with the local introduction of a model of quality teaching and the professional development model associated with it. The model was intended to support teacher professional learning and whole-school change through an emphasis on classroom practice (New South Wales Department of Education & Training, 2004).

These new policy directions increased funding and resources to schools to focus teacher professional learning on nurturing the twenty-first-century "thinking teacher". This direction was in contrast with the situation over the previous decade, when professional learning and development had been largely restricted to policy changes, with less impact on student classroom experience. The new policies, including the AGQTP, were focused on changing teacher practice through an action learning approach. Action learning was developed by Revans in the 1940s and can be defined as a means by which people learn with and from each other by attempting to identify and then implement solutions to their problems/issues (Revans, 1983). Action learning was seen as an effective form of professional development, whereby teachers could improve teaching and learning through developing, implementing, describing, reflecting and evaluating the effects of a common plan of action. This plan was to be developed in collaborative teams working with an academic partner to provide specialist assistance and guidance and to encourage learner-centred professional learning opportunities as well as the development of learning communities (Ewing, 2002 and Senge, 2000 as cited in Ewing, 2004). It was considered that successful reform, reflection and ongoing learning would be encouraged in schools acting as "learning communities" (Ewing, 2004). Francis Plummer, the manager for the AGQTP program for NSW, argued that there had been a shift in professional learning in NSW "from a "culture of dependency", where professional learning needs were framed by outsiders and delivered to teachers, toward a culture of "proactive participation", where stakeholders were involved in a "collective struggle" to build capacity in schools and individuals" (Doecke, Parr, & North, 2008, p. 156). Thus, a normative-re-educative approach (according to Chin and Benne's schema) was implemented in professional learning around the NSWQTM.

To provide some clarification as to the contexts in which the research was conducted, it is useful to note that New South Wales is largest populated state of Australia providing the education for approximately 760,000 students in 2,200 public schools. Curriculum in the NSW education system at the time of the study was developed by NSW Board of Studies delivered through seven Key Learning Areas (KLAs) in six stages. The HSIE KLA covers a wide range of social science subjects, including history and geography (New South Wales Board of Studies, 2003a, 2003b). These subjects occupy the majority of HSIE time in Stages 4 and 5, where the study was undertaken.

This study applied qualitative methods in the form of one semi-structured interview per teacher to locate the meaning that these teachers placed on the events, processes and structures in their teaching (Denzin & Lincoln, 2008; Fontana & Frey, 2005; Olson, 2011) to answer the research question. The decision to use interviewing had a pragmatic appeal as the teacher participants were all very busy people and they found it hard to give their time to this project beyond classroom observations. Pragmatically, interviews do not take long to conduct and can be organised at convenient times at either the researcher's school or at the HSIE teacher's school at the conclusion of a school day. The interviews took place after the researchers had given NSWQTM-based feedback on a number of participant classroom teaching lessons. This method facilitated open and rich discussion by removing the distractions that are a part of the everyday work lives of teachers.

Of the volunteer participants, who provided a mix of city regional schools, four were head teachers (subject head teachers of history and geography), one had been relieving as a head teacher, HSIE, for over 12 months and one was a head teacher of Administration. As the other participant was also an experienced teacher, the participants could well be described as being experienced teachers.

To enhance factual accuracy, the interviews were electronically recorded and when the interviewing was completed, transcription at a number of levels occurred to enable text analysis to take place (Kvale, 1996; Schwandt, 2007). The first draft was unedited with a second edited version developed to support data analysis and before the coding of the text was undertaken, the researcher read and reviewed the transcripts several times to record thoughts, questions and ideas, as suggested by Strauss and Corbin (1998).

In this study, Strauss and Corbin's grounded theory approach was utilised for coding, data reduction and simplification. In grounded theory, "open coding" is the initial type of coding undertaken and involves an unrestricted approach to break the data down into discrete parts that can be closely examined and compared for similarities and differences (Ayres, 2007; Charmaz, 2003, 2005; Creswell, 1998; Creswell & Plano Clark, 2011; Strauss, 1987; Strauss & Corbin, 1998).

As the transcripts of the HSIE teachers were a window into experience rather than being the object of study, as in more linguistically based analysis, coding was at a paragraph level, although many of the paragraphs could have contained multiple codes (Ryan & Bernard, 2000). Therefore, the coding on broad themes using N.VIVO software techniques supported an "open coding" approach rather than a very detailed analysis of the text. Once the fragments of data related to a particular idea or a concept had been identified, they were brought together to create categories of data that had some common properties, elements or themes. That is, everything that belonged to one category was reassembled in one place. Tesch (1990) refers to this reassembly process as "recontextualistion".

4. Findings and clarifications

Many factors influence teachers and teaching. What follows is the research results encapsulating the observations of seven experienced teachers as they reflected on their own experience of professional learning and its impact on teaching during the introduction of the NSWQTM and the NSW Quality Teaching Projects.



5. Isolated and individual learning—empirical-rational strategies

Overall, the responsibility to implement change was focused on the individual teacher, with many of these experienced teachers not impressed. These HSIE teachers' past professional development experiences and learning about the NSWQTM were mainly consistent with Chin and Benne's empirical-rational strategies. Underlying empirical-rational strategies is a linear process of change focusing on traditional paradigms of teacher professional development, learning and change (Richardson & Placier, 2001). Consistent pseudonyms are used to identify the source of the comments reported below.

Common professional learning with the introduction of the NSWQTM was "top-down (directed by somebody else besides the teachers concerned) professional development" (Mr. Wilson). Common learning contexts inside schools were faculty and staff meetings, at the beginning or end of the school day. Workshops on school development days (SDD) "using the NSW Department of Education videos" (Ms. Norris) were the main resources for learning about the NSWQTM. Outside school, teachers attended conferences and workshops such as "Pedagogy in Practice" (Ms. Smith). Mr. Dennis indicated that his school (Blue Ridae High) and another combined on a SDD to learn about Quality Teaching from a guest speaker from the local university (Table 1).

However, the teachers' conversations indicated that these empirical-rational strategies were limiting teacher learning and change. Firstly, staff meetings were seen as having little to do with developing classroom practice and were mainly "focused on ... student's behaviour and resources" (Mr. Wilson) and "departmental directives" (Mr. Brown). Workshops on SDD or workshops outside school were not valued and were a "good chance to do nothing" (Mr. Brown) as teachers' would "go to the workshop, read a book, tick it off, do a few exercises" (Mr. Wilson). Given this, there was a aenuine feeling that some teachers only attended staff meetings and workshops because they were compelled to do so. It would seem that teachers took the opportunity to do very little—staff meeting and workshops were apparently seen as opportunities to disengage.

Teachera	School	Grade and subject level	Years teaching	Position
Ms. Smith	Cherry View High School	Year 9 Geography (Stage 5)	12	Head Teacher HSIE
	Co-educational 7–12 school, both selective and local area entry			
	Student population: 1,000			
Mr. Brown ^b	Mountain View High School	Year 10 history (Stage 5)	16	Head Teacher Administration
	Co-educational school 7–12			
Mr. Reynolds ^b	Student population: 500	Year 10 geography (Stage 5)	20	Head Teacher HSIE
Mr. Wilson	Red Ridge High School	Year 10 geography (Stage 5)	22	Head Teacher HSIE
	Co-educational school 7–10			
	Student population: 900			
Ms. Norris	Cedar Ridge High School	Year 8 history (Stage 4)	26	Classroom Teacher
	Co-educational school 7–12, selective entry			
Mr. Jones	Student population: 1,100	Year 8 geography (Stage 4)	15	Head Teacher HSIE
Mr. Dennis ^b	Blue Ridge High School	Year 8 geography (Stage 4)	26	Relieving Head Teacher HSIE
	Co-educational school 7–12			

^aPseudonyms used for teacher and school identification.

^bParticipated in AGQTP regional professional development sessions.

Secondly, follow-up sessions and/or time for ongoing professional learning was important because something "learnt on the first day of term, quite often, it was the last time you saw or heard of it" (Mr. Reynolds) and "then it (learning) disappears into the evening" (Mr. Wilson). Mr. Brown's phrases, "I'm on class" and "there is no time to incorporate ideas except outside of school" signify total responsibility of planning for, implementation and assessing student performance and professional learning is almost an extra distracting teachers from their core business.

Thirdly, there was a clear indication that the time-of-the-day was an important factor supporting quality professional learning outcomes (including learning involving the *Quality Teaching* model). As such, professional learning at the end of the school day whether in workshops or at a faculty or staff meeting was seen as "not really conducive to learning" (Mr. Brown).

Fourthly, effective professional learning (at least for pedagogical change) needs to have a class-room focus. However, opportunities to collaborate with colleagues "to reflect on what happens in a particular lesson or a particular program" (Ms. Norris) were limited. These more experienced teachers, in particular, apparently found NSWQTM professional learning to be very basic as it was mainly "implemented in workshop sessions signalling (ed) that traditional approaches still permeated" (Mr. Brown) and not as expected, collaboratively in classrooms. In other words, "old" approaches to "new" strategies were used to implement pedagogical change.

6. Teachers working together—normative-re-educative strategies

The AITSL (2012) pointed out that professional learning develops communities within and between schools, and teachers and school leaders needed to have some ownership of the process. As such, despite the pervasiveness of empirical-rational strategies, there were teachers and schools involved in more collaborative, reflective professional learning within the normative-re-educative approach.

In understanding the notion of teacher reflection, Dewey (1933) defined reflective thought as "active, persistent and careful consideration of any belief or supposed form of knowledge in the light of the grounds that support it and the further conclusions to which it tends" (p. 118) with teachers needing to identify the problem and develop solutions to generate change. Schon's (1983, 1987) later perception of a reflective practitioner involved "reflection-in-action" by teachers as the art of teaching unfolds and "reflection-on-action" to understand the knowledge inherent in practice to resolve the everyday tensions created by practice.

Individual "reflection-on-action" assisted Mr. Reynolds to "improve preparation and understanding of Quality Teaching in regards to Stage 4 and 5 Geography" and helped Mr. Wilson better understand what was "happening in the classroom and things that he (I) could (can) look at for self-improvement". As such, the NSWQTM enabled teachers to inquire into classroom practice by providing a common language about such pedagogy. However, while individual "reflection-on-action" was seen as effective in promoting change, the notion of teachers working collectively together to discuss classroom practice was more difficult to implement at the faculty level.

Collective "reflection-on-action" using the NSWQTM was a professional learning strategy evident in Mr. Wilson's HSIE faculty. To assist in understanding practice, he asked the teachers to "self-code some lessons" and make personal judgements about the quality of classroom instruction using the NSWQTM. To generate self-awareness, reflective dialogue with colleagues was to occur during faculty meetings. However, while this professional learning strategy seemed simple, the proposition was more difficult to implement than Mr. Wilson had envisaged. Problems emerged as most of the HSIE teachers in the faculty saw the NSWQTM as just a "rebadging of some old issues" and therefore, "just something else that they had to learn".

Mr. Wilson believed that using self-coding strategies would help allay teachers' cynicism, but while he viewed the self-coding as a way of improving classroom practice, the HSIE teachers under his supervision were concerned that it was a supervision practice to assess "their competence in the classroom". The teachers believed that the self-coding, as perceived by Mr. Wilson, would become part of the faculty's "Teacher Assessment Review Schedule" or TARS (New South Wales Department of Education & Training, 2011). In NSW public schools, TARS requires teachers to demonstrate professional competence through a set of performance standards. In the end, concern about how the information could be used to judge their professional competence led that particular group of teachers to reject the collaborative approach embedded in NSWQTM.

The importance of networking as a professional learning strategy was highlighted in all the teachers' conversations. Examples of activities could include subject or KLA coordinators' meetings, peer mentoring and coaching sessions, leadership courses, network days, joint visits to network schools, identifying experts within a network to facilitate the sharing of practice or different professionals or groups of professionals working within schools on a more individual basis (Varga-Atkins et al., 2009). At Cherry View High, strong networking was evident between faculties, including the Mathematics and the HSIE faculty, Ms. Smith (HT HSIE) indicated that networking in the school created "discourse communities", and so "things (are) were not being done in isolation". She further argued that networking, by "building momentum" in the school, was able to reduce the inertia exhibited by more experienced and "at times, cynical teachers who were suspicious of change". Importantly, while these cross-faculty collegial ties may have assisted the teachers in Ms. Smith's HSIE faculty to move beyond faculty-based paradigms and subcultures, which she saw as powerful agents to support change, they can also fragment teacher learning and reinforce traditional cultural norms and instructional approaches (Bidwell & Yasumoto, 1999). Working with another discipline group can assist in questioning locally received wisdom but, ironically, this in it self can undermine discipline integrity.

It was also apparent that whole-school teaming approaches operating within some schools in the study were common mechanisms supporting teacher learning and learning involving the NSWQTM. The literature suggests that teaming has the capacity to bridge the gap between isolated individual learning and collective learning by providing opportunities for groups of teachers to consider the teaching and the intellectual stimulus of working together and to challenge and move thinking forward (Cardno, 2002; Dooner, Mandzuk, & Clifton, 2008; Giroux, 1992; Lieberman & Miller, 2005; Mooney Simmie, 2007; Supovitz, 2002). However, communication issues, some professional jealousies, engendered by perceptions of teacher favouritism and an inability to establish the shared goals and the vision needed to promote collective responsibility; all impacted on the effectiveness of teaming in the schools in this study.

At Cedar Ridge High, a whole-school teaming approach created tensions and disharmony between those involved and other teachers in the school. According to Ms. Norris and Mr. Jones, the tensions occurred because of a lack of communication by the Quality Teaching team with other staff members about what they were doing. Even though the team was seen to be doing good work, they were perceived a small group of "trampolines" [colloquial expression for those who are looking for promotion], teachers who formed a clique, seeking promotion, motivated by self-interest. As a result, there was not a "lot of evidence of what is going on at those meetings being communicated to the rest of the staff; or the opportunity to invite one of those people to a lesson to get feedback" (Ms. Norris). Thus, the perceived inability of the Quality Teaching team to work for the good of all teachers and learn about the NSWQTM by creating disharmony destabilised professional relationships amongst teaching staff.

At Blue Ridge High, a whole-school teaming approach embodied a very different paradigm of professional learning to what most teachers had previously experienced, making problematic its use to introduce Quality Teaching into classroom practice through an NSWQTP. According to Mr. Dennis, "the school as a whole tried to make Quality Teaching a priority" with faculty head teachers given the responsibility as team leaders to manage the professional learning. In supporting professional learning, the school provided time for teachers, eight or nine at a time, to go-off and do the training for the day with their university partner. Mr. Dennis said, what was important was that teachers were

able to "team up with someone else that has been through the training" and were encouraged to observe each other's lessons.

However, while the whole-school teaming approach seemed to be working, commitment and participation were variable and many of the participants were not totally dedicated to the vision. Mr. Dennis described the process as "encouraged osmosis" with some teachers giving the impression to the others of being interested in reframing practice using the NSWQTM but actually having peripheral involvement (Lave & Wenger, 1991). In this circumstance, what (Grossman, Wineburg, & Woolworth, 2001) described as a "pseudocommunity" of practice formed at Blue Ridge High School, with participants wanting to give the impression to others that they are conforming to group norms without making any real changes to classroom practice.

On the other hand, whole-school teaming at Mountain View High School seemed to have had a positive impact on both teacher and student learning. Mr. Reynolds explained that funding allowed teachers and students in "long periods-of-time in days set aside" to work collaboratively with a university partner to explore new ideas and terminology of the NSWQTM. Furthermore, by his account, the students were better able to link the different Quality Teaching elements to the teaching they received in their classrooms. The teachers' perceptions of the effectiveness of the teaming approaches in their schools to increase the professional autonomy were very different.

7. Quality educational leadership—the key to teacher change

In current discussions, the quality of educational leadership is seen as a key influence in what happens in the core business of schools, teaching and learning (Mulford, 2005; Mulford et al., 2007). In the NSW context, the Ramsey Report (2000) stressed linkages between leadership in education, school effectiveness and the quality of teaching. To support teacher professional learning, generally, and professional learning associated with the introduction of the NSWQTM, two leadership traits were identified from the teachers' conversations as being essential ingredients for innovation.

Firstly, leadership in schools need to create a "shared vision and sense of purpose". Mr. Wilson believed that "If the powers to be are genuinely sincere about Quality Teaching being imbedded in our professional practice I think they need to push it that is, the deputy principal and principal". According to Louis et al. (1996), a shared vision and sense of purpose is important in schools as it forms the basis of the "moral authority in a school community" (p. 760) to create the language, actions and underlying assumptions about teaching and student learning. Developing "shared vision and sense of purpose" is also consistent with the notion of transformational leadership. Transformational leadership practices include providing individual, cultural and instructional support to staff, capturing a vision for the school, communicating high-performance expectations and offering intellectual stimulation during professional learning (Hallinger, 2003; Silins & Mulford, 2002). Therefore, without a "shared vision and sense of purpose" it is unlikely that Quality Teaching will become part of everyday classroom practice, instead becoming as Mr. Wilson suggests, a "flash in the pan" model.

Secondly, "coherence between school management and professional learning plans" was seen as fundamental in meeting the learning needs of teachers to improve practice. Programme coherence is the extent to which school programmes are effectively coordinated and focused on clear learning goals, sustained over time to stimulate teacher learning about new pedagogical knowledge and skills (Dinham, 2007b; Garet, Porter, Desimone, Birman, & Yoon, 2001; Hallinger, 2003; Ylimaki, 2007). Programme coherence involves instructional leadership to focus school leadership on affecting the behaviours of teachers to support or otherwise the learning outcomes of students (Blase & Blase, 1998; Glanz, 2007; Gurr, Drysdale, & Mulford, 2007; Hallinger, 2003; Ylimaki, 2007).

However, from these teachers' accounts these leadership practices were not working effectively inside some schools. Mr. Jones didn't "feel it was valuable (school based professional development) because there is never been any plan or any school commitment from them (school executive)". Mr. Wilson added "even our professional development programs are incomplete. It should be a part of

the whole school plan!" Furthermore, Mr. Norris found that a "lack of communication between faculties, administration and planning" reduced the effectiveness of professional learning about Quality Teaching.

These finding indicate the importance that these HSIE teachers placed on educational leadership, not only to facilitate the professional learning of teachers but in understanding the processes by which teachers grow professionally and the conditions that support and promote that change. The teachers believed that their school principals and executives needed to act as transformational leaders to inspire teachers by creating a "shared vision and sense of purpose" and "coherence between school management and professional learning plans" if Quality Teaching was to become part of everyday classroom practice. However, in essence "weak ties" existed between educational leadership and professional learning that constrained teachers' capacity to implement Quality Teaching into everyday classroom practice.

8. Impacts and implications

While this study involves only a small sample of teachers and is focused on a series of single, individual interviews, those interviews provided powerful insights into what professional learning was successful for these HSIE teachers. To use the language of Chin and Benne (1976), these findings indicated that there was a pervasiveness of empirical-rational strategies and a flavour of normative-re-educative and power-coercive professional learning, but this attempt to implement a state-wide model for teacher improvement was certainly in the spirit of best practice professional learning (Darling-Hammond et al., 2009). Furthermore, while the HSIE teachers realised that traditional skills-based view of learning was not particularly effective, engagement in both collaborative and individual reflection encouraged them to cast a critical eye on their own teaching practice.

In understanding the effectiveness of what Chin and Benne would describe as empirical-rational approaches, the HSIE teachers argued that traditional contexts rarely provided opportunities to apply new knowledge and skills in day-to-day classroom settings, or explore Quality Teaching. In essence, empirical-rational approaches isolated teachers in classrooms, with only those highly motivated likely to make an effort to evaluate and change classroom practice. Importantly, treating knowledge and skills in isolation from teaching contexts can encourage teachers to view their teaching world in terms of recipes of "tried and true practices" as Dall'Alba and Sandberg (2006) reminded us (p. 385), and such practices that may not necessarily align with quality pedagogy.

There was also acknowledgement of the value of professional learning, involving normative-re-educative strategies. Individual "reflection-on-action" enabled some of the HSIE teachers to understand and further develop their classroom pedagogy. In this way, instead of making decisions based on a personal sense of what was working and what was not working in their classrooms, these teachers began to reflect on day-to-day practice using the NSWQTM. However, the notion of teachers collectively reflecting on classroom practice using the NSWQTM with colleagues was more challenging to implement across schools and within faculties in the study.

The findings indicated that if teachers' needs, concerns and emotions are not addressed through professional learning, then innovations, exemplified in this case by the NSWQTM pedagogy, may stretch beyond their reach. In understanding teachers' reactions to collective "reflection-on-action" (self-coding approach), research suggests that the implementation of innovations into teaching is strongly influenced by the needs, concerns and emotions of the teachers (Fuller, 1969; Hall & Loucks, 1977; Louis & Marks, 1998; van den Berg, 2002; Van der Vegt, Smyth, & Vandenberghe, 2001). The self-coding approach resisted by the HSIE teachers in Mr. Wilson's faculty exhibited a type of personal or self-concern described by van den Berg (2002). When teachers (such as Mr. Wilson and those in his HSIE faculty) believe that their professional identities are under question, changes in classroom practices are unlikely, as their capacity to perform at a given level of competence is constrained (Goddard, Hoy, & Hoy, 2000). Additionally, the research conducted by Ross (1995) indicated that in such situations, teachers are more prone to stress, have low levels of efficacy, low levels of

motivation and often avoid, or react defensively, new ideas and theories. Van der Vegt and his co-workers (2001) also found that when introducing innovations, the behaviour of each teacher needs to be considered within the context of the organisation, the task and the school culture.

The difficulties experienced in enacting collective "reflection-on-action" (self-coding approach) could be further explained through organisational theory, specifically, Siskin's (1994) notion of high school departments or faculties as occupationally "ethnocentric" social worlds. Faculties as "ethnocentric" social worlds are supported by social interactions that encourage stability to reinforce the legitimacy of normatively preferred instructional practices. As such, faculties are powerful discourse communities that can either legitimise or resist change. As a group, the HSIE teachers (in Mr. Wilson's HSIE faculty) in resisting the self-coding approach were, perhaps due to the empirical-rational approaches, inclined to think in terms of "my kids, my classroom and my subject" (Darling-Hammond & McLaughlin, 1995). Therefore, it was not easy to achieve a CP to situate teacher professional learning in the classroom.

It was apparent that teaming approaches operating within some schools supported teacher learning and learning involving the NSWQTM. However, while teaming was common, the promotion of this type of professional learning was more difficult than the proponents may envisage. A number of interrelated factors were perceived as reducing the effectiveness of teaming in supporting teacher professional learning.

Firstly, tensions between teacher groups weakened ties, destabilised professional relationships and subsequently reduced the collective capacity of the teachers to introduce this change into everyday classroom practice. Other studies, for example Grossman et al. (2001), also found a combination of underlying conditions including teacher personalities, interests, backgrounds, differing levels of experience and subject expertise-generated conflict and tension between teachers in a professional learning team. Secondly, the level of teacher participation, commitment and motivation to teaming can impact the effectiveness of change within schools. Two schools in the study had support to engage teachers in setting the agenda in relation to their own learning, but there was clear indication that some teachers were giving the impression to the others of reframing practice without making any real change. On the other hand, in the other school, while funding and professional learning were similar, the teaming approach supported learning across the school for both students and teachers. These findings suggest that while teaming would seem to be an unproblematic venture, engagement is not automatic, with continual engagement in active learning needing to develop the skills oriented towards improving teaching practice.

Thirdly, networking as a professional learning strategy seemed to be more successful as it supported the formation of new collegial ties between faculties and teachers that provided a structural base for the formation of a collective understanding. However, it needs to be noted that while networking was seen as enriching and enhancing collective learning, faculty-based paradigms and subcultures (as experienced with the schools involved in the teaming approach), while being powerful agents to support change, can also fragment teacher learning, reinforce traditional cultural norms and instructional approaches (Bidwell & Yasumoto, 1999).

The development of whole-school approaches to teacher learning reflects an increased emphasis upon collaborative learning practices, which contrast with the individualistic practices. However, the "weak ties" existed between educational leadership and professional learning to constrain the ability of schools to support collaborative learning practices involving the NSWQTP, notwithstanding its status as a state and nationally funded planning project and initiative. As such, the role of educational leadership to bridge the gap between individualistic and collaborative learning practices cannot be overstated.

The HISE teachers clearly saw that leadership needed to create a "shared vision and sense of purpose" to transform school culture and to foster a long-term orientation towards change, an

imperative for learning (Hallinger, 2003; Mulford, 2005; Mulford et al., 2007). There was also a common belief that "program coherence" was needed to the effectively coordinate the professional learning processes and sustain learning goals over time. To strengthen the links between these leadership traits, the emphasis needs not only to be on the principal's leadership, but also on teachers as members of professional learning teams, to make certain management plans and professional learning are aligned. With leadership distributed across the school, a change in classroom pedagogy is more likely, with teachers collectively "creating a shared vision" and the conditions for effective professional learning.

Overall, the findings indicate that professional learning needs to be creative in meeting the learning needs of all teachers from the novice to the more experienced. To facilitate professional learning, there is a need not only to understand the processes by which teachers grow professionally, but to understand the environment that supports and promotes that growth. However, as Johnson (2012a) reminds us "changing the people without changing the contexts in which they work is not likely to substantially improve the school" (p. 108). Therefore, the need for quality across school leadership to support professional learning for pedagogical improvement cannot be overestimated.

9. Looking to the future

The findings in this study are especially potent since they provide insights into what these teachers wanted from their educational leaders and what they found helpful in supporting professional learning and change. They seemed to realise that traditional patterns of "in-service" were not particularly effective. On the other hand, engagement in both collaborative and individual reflection could encourage them to cast a critical eye on their own teaching practices. As such, twenty-first-century teacher professional learning needs to be relevant, collaborative and future focused (AITSL, 2012).

What does relevant mean; relevant to whom? A key indicator of relevance according to the AITSL (2012) "is matched to the experiences, strengths, current knowledge, career stage and goals of the adult learner" (p. 4). This would thus imply a context-explicit notion, difficult to gauge from a system perspective and implying multiple school approaches, or even teacher individual plans. Professional learning that is future focused develops high-level skills matched to the experiences, strengths, current knowledge, career stage and goals of the learner. Future-focused professional learning enables "teachers and school leaders to adapt and excel in a rapidly changing and hyper-connected world" (AITSL, 2012, p. 5). According to the AITSL (2012), professional learning also needs to develop communities within and between schools, and teachers and school leaders need to have some ownership of the process. Therefore, the best professional learning, while seeking to improve pedagogy, needs to develop teachers' understanding of what practices work in different teaching contexts and the reasons to why they work. For change to occur, professional learning should have a classroom focus, which is ongoing, reflective and collaborative.

Further, as pointed out in the *Change Over Time?* project (Hargreaves & Goodson, 2006), history and experience of teachers and teaching communities should be seen as "strengths to be drawn on rather than obstacles to be overcome" (p. 35). The politics and the historical context can guide professional learning changes if leaders can be found to allow (enable, trust and support) this to happen. Quality educational leadership is essential in delivering the changes, improvements and performance society increasingly expects of schools (Dinham, 2007a, 2007b). Given these complexities, there is a need for educational leaders to implement strategies to engage teachers seriously in effective, ongoing professional learning, for the *Quality Teaching* model or any other model of good teaching practice, to make a substantial difference in student learning. However, the challenges for educational systems to improve the pedagogical practices of teachers should not be underestimated. Change is possible, but it depends on a complex interplay of effective model, effective leadership and supportive context. This study suggests that all three need to be present for pedagogical change to occur.



Funding

The authors received no direct funding for this research.

Author details

Ken Edge¹

E-mail: kenneth.edge@det.nsw.edu.au

Ruth Revnolds²

E-mail: Ruth.Reynolds@newcastle.edu.au

Mitch O'Toole

E-mail: mitch.otoole@newcastle.edu.au

ORCID ID: http://orcid.org/0000-0003-0648-9233

- ¹ NSW Department of Education, Miller Technology High School, Cabramatta Avenue, Miller, New South Wales 2168, Australia
- ² School of Education, University of Newcastle, Callaghan, Australia.
- ³ Faculty of Education and Arts, School of Education, University of Newcastle, University Drive, Callaghan, New South Wales 2308, Australia.

Citation information

Cite this article as: Contextual complexity: The professional learning experiences of seven classroom teachers when engaged in "quality teaching", Ken Edge, Ruth Reynolds & Mitch O'Toole, Cogent Education (2015), 2: 1120002.

References

- Achinstein, B., Ogawa, R. T., & Speiglman, A. (2004). Are we creating separate and unequal tracks of teachers? The effects of state policy, local conditions, and teacher characteristics on new teacher socialization. *American Educational Research Journal*, 41, 557–603. http://dx.doi.org/10.3102/00028312041003557
- Australian Government Department of Education Employment and Workplace Relations. (n.d.). Australian Government Quality Teacher Program (AGQTP). Retrieved from http:// www.aisnsw.edu.au/fundedprograms/agqtp/pages/ default.aspx
- Australian Institute for Teaching and School Leadership. (2012). Australian charter for the professional learning of teachers and school leaders. South Carlton: Education Services Australia.
- Ayres, L. (2007). Qualitative research proposals—Part II.

 Journal of Wound, Ostomy and Continence Nursing, 34, 131–133.
 - http://dx.doi.org/10.1097/01.WON.0000264823.57743.5f
- Bidwell, C. E., & Yasumoto, J. Y. (1999). The collegial focus: Teaching fields, collegial relationships, and instructional practice in American high schools. Sociology of Education, 72, 234–256.

http://dx.doi.org/10.2307/2673155

- Blase, J., & Blase, J. (1998). Handbook of instructional leadership: How really good principals promote teaching and learning. Thousand Oaks, CA: Corwin Press.
- Borko, H. (2004). Professional development and teacher learning: Mapping the terrain. *Educational Researcher*, 33, 3–15.

http://dx.doi.org/10.3102/0013189X033008003

Cardno, C. (2002). Team learning: Opportunities and challenges for school leaders. School Leadership and Management, 22, 211–223.

http://dx.doi.org/10.1080/1363243022000007764

- Cardno, C. (2005). Leadership and professional development: The quiet revolution. *International Journal of Educational Management*, 19, 292–306.
- Charmaz, K. (2003). Qualitative interviewing and grounded theory analysis. In J. A. Holstein & J. F. Gubrium (Eds.), *Inside interviewing: New lenses, new concerns* (pp. 311– 330). Thousand Oaks, CA: Sage.
- Charmaz, K. (2005). Grounded theory in the 21st century. In N. K. Denzin & Y. S. Lincoln (Eds.), *The SAGE handbook of*

- qualitative research (pp. 507–536). Thousand Oaks, CA: Sage.
- Chin, R., & Benne, K. D. (1976). General strategies for effecting changes in human systems. In W. G. Bennis, K. D. Benne, R. Chin, & K. E. Corey (Eds.), The planning of change (3rd ed., pp. 22–45). New York, NY: Holt, Rinehart & Winston.
- Clarke, D., & Hollingsworth, H. (2002). Elaborating a model of teacher professional growth. Teaching and Teacher Education, 18, 947–967.

http://dx.doi.org/10.1016/S0742-051X(02)00053-7

- Cole, M., & Engestrom, Y. (1993). A cultural-historical approach to distributed cognition. In G. Salomon (Ed.), Distributed cognitions: Psychological and educational considerations (pp. 1–46). Cambridge: Cambridge University Press.
- Commonwealth of Australia. (2003). Commonwealth quality teacher programme: Updated client guidelines. Canberra: Department of Education, Training and Youth Affairs.
- Commonwealth of Australia. (2005). Australian government quality teacher programme: Client guidelines, 2005 to 2009. Canberra: Department of Education, Science and Training.
- Connell, R. (2009). Good teachers on dangerous ground: Towards a new view of teacher quality and professionalism. *Critical Studies in Education*, 50, 213–229. http://dx.doi.org/10.1080/17508480902998421
- Creswell, J. W. (1998). Qualitative inquiry and research design: Choosing among five traditions. Thousand Oaks, CA: Sage.
- Creswell, J. W., & Plano Clark, V. L. (2011). Designing and conducting: Mixed methods research (2nd ed.). Los Angeles, CA: Sage.
- Dall'Alba, G., & Sandberg, J. (2006). Unveiling professional development: A critical review of stage models. Review of Educational Research, 76, 383-412.
- Darling-Hammond, L., & McLaughlin, M. W. (1995). Policies that support professional development in an era of reform. Phi Delta Kappan, 76, 597–604.
- Darling-Hammond, L., Wei, R. C., Andree, A., Richardson, N., & Orphanos, S. (2009). Professional learning in the learning profession: A status report on teacher development in the United States and abroad (p. 33). Stanford, CA: National Staff Development Council.
- Denzin, N. K., & Lincoln, Y. S. (Eds.). (2008). Strategies of qualitative inquiry (3rd ed.). Los Angeles, CA: Sage.
- Doecke, B., Parr, G., & North, S. (2008). National mapping of teacher professional learning project: Final report (p. 276). Canberra: Department of Education Employment and Workplace Relations. Retrieved from http://apo.org.au/ node/19031
- Dewey, J. (1933). How we think: A restatement of the relation of reflective thinking to the educative process. New York, NY: Heath.
- Dinham, S. (2007a). Leadership for exceptional educational outcomes. Teneriffe: Post Pressed.
- Dinham, S. (2007b). How schools get moving and keep improving: Leadership for teacher learning, student success and school renewal. Australian Journal of Education, 51, 263–275.
- http://dx.doi.org/10.1177/000494410705100304 Doeck, B., Parr, G., & North, S. (2008). National mapping of teacher professional learning project. Melbourne: DEEWR.
- Dooner, A.-M., Mandzuk, D., & Clifton, R. A. (2008). Stages of collaboration and the realities of professional learning communities. *Teaching & Teacher Education*, 24, 564–574
- Edge, K. R. (2012a). "Playing it safe": Quality teaching in expert teacher classrooms (Unpublished Research Doctorate -Doctor of Philosophy (PhD)). The University of Newcastle Australia, Newcastle.
- Edge, K. R. (2012b). "Typical HSIE Pedagogy"—Quality teaching in NSW HSIE classrooms. Retrieved from http://www. aare.edu.au/papers/2012/Ken%20Edge-AARE%202012. pdf#zoom=85



- Ewing, R. (2004, September). Critical factors for conducting school-based action learning. Paper presented at the Quality Teaching Action Learning Conference, Sydney.
- Fontana, A., & Frey, J. H. (2005). The interview. In N. K. Denzin & Y. S. Lincoln (Eds.), *The SAGE handbook of qualitative research* (pp. 695–728). Thousand Oaks, CA: Sage.
- Fraser, C., Kennedy, A., Reid, L., & McKinney, S. (2007). Teachers' continuing professional development: Contested concepts, understandings and models. *Professional Development in Education*, 33, 153–169.
- Fuller, F. F. (1969). Concerns of teachers: A developmental conceptualization. American Educational Research Journal, 6, 207–226.

http://dx.doi.org/10.3102/00028312006002207

- Garet, M. S., Porter, A. C., Desimone, L., Birman, B. F., & Yoon, K. S. (2001). What makes professional development effective? Results from a national sample of teachers. *American Educational Research Journal*, 38, 915–945. http://dx.doi.org/10.3102/00028312038004915
- Giroux, H. A. (1992). Teachers as transformative intellectuals. In J. M. Rich (Ed.), *Innovations in education reformers and their critics* (6th ed., pp. 83–88). Boston, MA: Allyn and Bacon.
- Glanz, J. (2007). On vulnerability and transformative leadership: An imperative for leaders of supervision. International Journal of Leadership in Education, 10, 115–135.

http://dx.doi.org/10.1080/13603120601097462

Goddard, R. D., Hoy, W. K., & Hoy, A. (2000). Collective teacher efficacy: Its meaning, measure, and impact on student achievement. American Educational Research Journal, 37, 479–507.

http://dx.doi.org/10.3102/00028312037002479

- Gore, J. M., & Ladwig, J. G. (2006). Professional development for pedagogical impact. Paper presented at the Australian Association for Research in Education Annual Conference. Retrieved from http://www.aare.edu.au/06pap/gor06389.
- Grossman, P., Wineburg, S., & Woolworth, S. (2001). Toward a theory of teacher community. *Teachers College Record*, 103, 942–1012.

http://dx.doi.org/10.1111/tcre.2001.103.issue-6

- Grundy, S., & Robison, J. (2004). Teacher professional development: Themes and trends in the recent Australian experience. In C. Day & J. Sachs (Eds.), International handbook on the continuing professional development of teachers (pp. 146–166). Maidenhead: Open University Press.
- Grushka, K., McLeod, J., & Reynolds, R. (2005). Reflecting upon reflection: Theory and practice in one Australian University teacher education program. *Reflective Practice*, 6, 239–246.

http://dx.doi.org/10.1080/14623940500106187

- Gurr, D., Drysdale, L., & Mulford, B. (2007). Instructional leadership in three Australian schools. *ISEA*, 35, 20–29.
- Guskey, T. R. (1986). Staff development and the process of teacher change. Educational Researcher, 15, 5–12. http://dx.doi.org/10.3102/0013189X015005005
- Hall, G. E., & Loucks, S. F. (1977). A developmental model for determining whether the treatment is actually implemented. American Educational Research Journal, 14, 263–276.

http://dx.doi.org/10.3102/00028312014003263

- Hallinger, P. (2003). Leading educational change: Reflections on the practice of instructional and transformational leadership. Cambridge Journal of Education, 33, 329–352. http://dx.doi.org/10.1080/0305764032000122005
- Hardy, I. (2008). Competing priorities in professional development: An Australian study of teacher professional development policy and practice. Asia-Pacific Journal of Teacher Education, 36, 277–290.

- Hargreaves, A., & Fullan, M. (1998). What's worth fighting for out there. New York. NY: Teachers College Press.
- Hargreaves, A., & Goodson, I. (2006). Educational change over time? The sustainability and nonsustainability of three decades of secondary school change and continuity. Educational Administration Quarterly, 42, 3–41. http://dx.doi.org/10.1177/0013161X05277975
- Hattie, J. (2003). Teachers make a difference: What is the research evidence? Paper presented at the Australian Council for Educational Research Conference.

 Retrieved from http://research.acer.edu.au/ research conference 2003/4/
- Hoban, G. F. (2002). Teacher learning for educational change: A systems thinking approach. Buckingham: Open University Press
- Johnson, S. M. (2012a). Having it both ways: Building the capacity of individual teachers and their schools. Harvard Educational Review, 82, 107–122. http://dx.doi.org/10.17763/haer.82.1.c8515831m501x825
- Johnson, S. M. (2012b). Build the capacity of teachers and their schools. *Phi Delta Kappan*, *94*, 62–65.

http://dx.doi.org/10.1177/003172171209400215

- Kelly, P., & Williamson, M. (2002). Decentralisation of professional development: Teachers' decisions and dilemmas. Journal of In-Service Education, 28, 409–426. http://dx.doi.org/10.1080/13674580200200224
- Kennedy, A. (2005). Models of continuing professional development: A framework for analysis. *Journal of In-Service Education*, 31, 235–250. http://dx.doi.org/10.1080/13674580500200358
- Knight, P. (2002). A systemic approach to professional development: Learning as practice. Teaching and Teacher Education, 18, 229–241.

http://dx.doi.org/10.1016/S0742-051X(01)00066-X

- Kvale, S. (1996). Interviews: An introduction to qualitative research interviewing. Thousand Oaks, CA: Sage.
- Lave, J., & Wenger, E. C. (1991). Situated learning. Cambridge: Cambridge University Press. http://dx.doi.org/10.1017/CBO9780511815355
- Lieberman, A., & Miller, L. (2005). Teachers as leaders. The Educational Forum, 69, 151–162.
- http://dx.doi.org/10.1080/00131720508984679 Louis, K. S., Kruse, S., & Marks, H. M. (1996). Schoolwide professional community. In F. M. Newmann & Associates
- professional community. In F. M. Newmann & Associate: (Eds.), Authentic achievement restructuring schools for intellectual quality (pp. 179–203). San Francisco, CA: Jossey-Bass.

 Louis, K. S., & Marks, H. M. (1998). Does professional
- community affect the classroom? Teachers' work and student experiences in restructuring schools. American Journal of Education, 106, 532–576.
- Louis, K. S., Marks, H. M., & Kruse, S. (1996). Teachers' professional community in restructuring schools. American Educational Research Journal, 33, 757–798. http://dx.doi.org/10.3102/00028312033004757
- McCaffrey, D., Koretz, D. M., Lockwood, J. R., & Hamilton, L. (2004). Evaluating value-added models for teacher accountability. Santa Monica, CA: RAND.
- McNamara, G., O'Hara, J., Lisi, P., & Davidsdottir, S. (2011).

 Operationalising self-evaluation in schools: Experiences from Ireland and Iceland. *Irish Educational Studies*, 30, 63–82. http://dx.doi.org/10.1080/03323315.2011.535977
- Mooney Simmie, G. (2007). Teacher design teams (TDTs)— Building capacity for innovation, learning and curriculum implementation in the continuing professional development of in-career teachers. *Irish Educational Studies*, 26, 163–176. http://dx.doi.org/10.1080/03323310701295914
- Mulford, B. (2005). Quality evidence about leadership for organizational and student learning in schools. School Leadership & Management, 25, 321–330.



Mulford, B., Kendall, D., Edmunds, B., Kendall, L., Ewington, J., & Silins, H. (2007). Successful school leadership: What is it and who decides? Australian Journal of Education, 51, 228–246.

http://dx.doi.org/10.1177/000494410705100302

- New South Wales Board of Studies. (2003a). Geography years 7–10: Syllabus. Retrieved from http://www.boardofstudies. nsw.edu.au/syllabus sc/pdf doc/geography 710 syl.pdf
- New South Wales Board of Studies. (2003b). History year 7–10: Syllabus. Retrieved from http://www.boardofstudies.nsw. edu.au/syllabus_sc/pdf_doc/history_710_syl.pdf
- New South Wales Department of Education & Training. (2003).

 Quality teaching in NSW public schools: A classroom
 practice guide. Retrieved from https://www.det.nsw.edu.
 au/proflearn/areas/qt/index.htm
- New South Wales Department of Education & Training. (2004). Professional learning policy for schools. Retrieved from https://www.det.nsw.edu.au/proflearn/areas/plp/index. htm
- New South Wales Department of Education & Training. (2011).

 Teacher assessment and review schedule: Instructions for the completion of the teacher assessment and review schedule. Retrieved from https://detwww.det.nsw.edu.au/media/downloads/intranet/lists/directoratesaz/ires/epac/tarsschedule.doc
- O'Brien, M., Varga-Atkins, T., Burton, D., Campbell, A., & Qualter, A. (2008). How are the perceptions of learning networks shaped among school professionals and headteachers at an early stage in their introduction? *International Review of Education*, 54, 211–242.
 - http://dx.doi.org/10.1007/s11159-008-9084-1
- OECD. (2005). Teachers matter. Attracting, developing and retaining effective teachers. Paris: Author.
- Olson, K. (2011). Essentials of qualitative interviewing. Walnut Creek. CA: Left Coast Press.
- Putnam, R. T., & Borko, H. (2000). What do new views of knowledge and thinking have to say about research on teacher learning? *Educational Researcher*, 29, 4–15. http://dx.doi.org/10.3102/0013189X029001004
- Revans, R. W. (1983). The ABC of action learning (2nd ed.). Kent: Chartwell-Bratt.
- Richardson, V., & Placier, P. (2001). Teacher change. In V.
 Richardson (Ed.), *Handbook of research on teaching* (4th
 ed., pp. 305–337). Washington, DC: American Educational
 Research Association.
- Ross, J. A. (1995). Strategies for enhancing teachers' beliefs in their effectiveness: Research on a school improvement hypothesis. Teachers College Record, 94, 227–251.
- Ryan, G., & Bernard, R. (2000). Data management and analysis methods. In N. K. Denzin & Y. S. Lincoln (Eds.), *Handbook* of qualitative research (pp. 769–802). Thousand Oaks, CA: Sage.
- Schon, D. A. (1983). The reflective practitioner: How professionals think in action. New York, NY: Basic Books.
- Schon, D. A. (1987). Educating the reflective practitioner: Toward a new design for teaching and learning in the professions. San Francisco, CA: Jossey-Bass.

- Schwandt, T. A. (2007). The SAGE dictionary of qualitative inquiry. Los Angeles, CA: Sage.
- Silins, H., & Mulford, B. (2002). Schools as learning organisations. Journal of Educational Administration, 40, 425–446.

http://dx.doi.org/10.1108/09578230210440285

- Siskin, L. S. (1994). Realms of knowledge: Academic department in secondary schools. Washington, DC: Falmer Press.
- Stein, M. K., Smith, M. S., & Silver, E. A. (1999). The development of professional developers: Learning to assist teachers in new settings in new ways. *Harvard Educational Review*, 69, 237–270.
 - http://dx.doi.org/10.17763/haer.69.3.h2267130727v6878
- Strauss, A. L. (1987). Qualitative analysis for social scientists. Cambridge: Cambridge University Press. http://dx.doi.org/10.1017/CBO9780511557842
- Strauss, A. L., & Corbin, J. (1998). Basics of qualitative research: Techniques and procedures for developing grounded theory (2nd ed.). Thousand Oaks, CA: Sage.
- Sugrue, C. (2004). Rhetorics and realities of CPD across Europe: From cacophy towards coherence. In C. Day & J. Sachs (Eds.), Teachers' work (pp. 66–93). Maidenhead: Open University Press.
- Supovitz, J. A. (2002). Developing communities of instructional practice. Teachers College Record, 104, 1591–1626. http://dx.doi.org/10.1111/tcre.2002.104.issue-8
- Tesch, R. (1990). The mechanics of interpretational qualitative analysis qualitative research: Analytic types and software tools (pp. 113–146). Lewes: Falmer Press.
- Trotman, D. (2009). Networking for educational change: Concepts, impediments and opportunities for primary school professional learning communities. *Professional Development in Education*, 35, 341–356. http://dx.doi.org/10.1080/13674580802596626
- van den Berg, R. (2002). Teachers' meanings regarding educational practice. *Review of Educational Research*, 72, 577–625. http://dx.doi.org/10.3102/00346543072004577
- Van der Vegt, R., Smyth, L. F., & Vandenberghe, R. (2001). Implementing educational policy at the school level: Organization dynamics and teacher concerns. *Journal of Educational Administration*, 39, 8–23. http://dx.doi.org/10.1108/09578230110366883
- Varga-Atkins, T., Qualter, A., & O'Brien, M. (2009). School professionals' attitudes to professional development in a networked context: Developing the model of "believers, seekers and sceptics". Professional Development in Education, 35, 321–340. http://dx.doi.org/10.1080/19415250902846815
- Warrican, S. J. (2006). Action research: A viable option for effecting change. *Journal of Curriculum Studies*, 38(1), 1–14. http://dx.doi.org/10.1080/00220270500175537
- Ylimaki, R. (2007). Instructional leadership in challenging US schools. ISEA, 35, 11–19.
- Zeichner, K. M. (2003). Teacher research as professional development for P-12 educators in the USA. Educational Action Research, 11, 301–326. http://dx.doi.org/10.1080/09650790300200211



© 2015 The Author(s). This open access article is distributed under a Creative Commons Attribution (CC-BY) 4.0 license.

You are free to:

Share — copy and redistribute the material in any medium or format

Adapt — remix, transform, and build upon the material for any purpose, even commercially.

The licensor cannot revoke these freedoms as long as you follow the license terms.

Under the following terms:

Attribution — You must give appropriate credit, provide a link to the license, and indicate if changes were made. You may do so in any reasonable manner, but not in any way that suggests the licensor endorses you or your use. No additional restrictions

You may not apply legal terms or technological measures that legally restrict others from doing anything the license permits.

