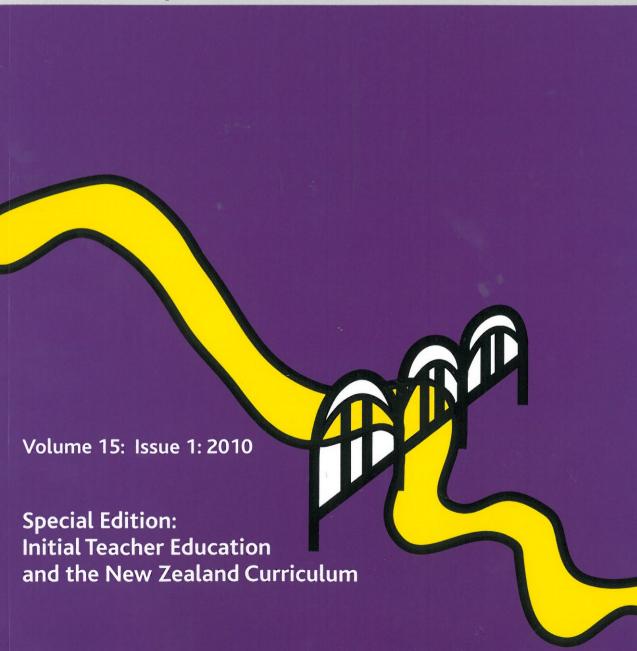


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ESTABLISHING THE "NEW" INTO "THE WAY WE DO THINGS": REVIEWING PAPER AIMS AND CONTENT IN RESPONSE TO NATIONAL AND LOCAL DEVELOPMENTS

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ABSTRACT This paper reports on a review of "Professional practice and inquiry I" in response to local and national developments. The introduction of The New Zealand Curriculum (Ministry of Education, 2007) raised questions for initial teacher educators about how they might prepare their pre-service student teachers to teach using this updated curriculum. "Professional practice and inquiry I" is a first semester compulsory professional paper University of Waikato Bachelor of Teaching students (primary). The introduction of the 2007 national curriculum document was not the only reason for a review of this professional paper. This paper outlines how the teaching team had recognized the mixture of influences that impact on the development of paper content, explains in some detail what we did for the teaching and learning of the new 2007 key competencies, and the outcomes we found through collecting student voice. This was part of a collaborative research project investigating the teaching and learning of the "front end" of The New Zealand Curriculum (ibid) and incorporating those findings into the primary Bachelor of Teaching programme.

KEYWORDS

Initial teacher education, key competencies, enduring understandings, course review and development

INTRODUCTION

Professional Practice and Inquiry 1 (PP&I 1) is the first compulsory professional practice paper that students take in the first semester of their teacher education programme. This paper introduces a range of pedagogical content and includes a regular half-day placement per week in local schools where students work in pairs in classrooms. PP&I 1 (including fully online (Net) and Tauranga on-campus versions) is team taught by nine teacher educators. Fundamental to our teaching in this paper is the use of the textbook, The Professional Practice of Teaching edited by Clive McGee and Deborah Fraser, now in its third edition (2008). Many of the authors of chapters in that book are current or past lecturers at the University of Waikato and most of the current lecturers teach in the primary programme. Other key literature informing this programme are Bell and Cowie's (2001) model of

interactive formative assessment–noticing, recognizing, responding, recording and revisiting, and Delors' (1996) four pillars of knowledge for education in the 21st century, learning to know, learning to do, learning to live together and learning to be.

The aims, content and assessment of this paper are regularly reviewed and evolve year by year as the result of teacher professional development, student feedback and broader changes and developments in primary programmes and education locally and nationally. The introduction of the 2007 national curriculum document provided another opportunity to revisit current practices and consider future directions (McChesney & Cowie, 2008). However, this was not the only influence on the review of the paper's content.

Paper Review

Each year in our review and development meetings for this paper we faced the same issues: changing teaching team members and a growing number of objectives to cover. There was also the question of how consistent the activities needed to be across the various tutorial classes. Along with these "annual" issues, we had also been in a process of reviewing the professional practice papers at first, second and third years of the degree to eliminate unnecessary overlaps in content and ensure students were getting adequate scaffolding in their developing knowledge and understanding. Professional studies lecturers involved in primary programmes began by looking at the aims and objectives of this paper in the context of later professional papers and its place in relation to concurrent and later curriculum papers. When teaching in a team that each year comprises of a combination of "old" and "new" members, the question continually arises, What is important about this paper? Teachers new to the paper need to have confidence in the answer to this question to develop their tutorial sessions and maintain the key messages for students. It is vital in first year papers to set the students off on the right foot, so to speak.

Thus a central question is: What is important for our beginning initial teacher education students to know and understand in their first months of their programme combined with their first days as students teachers in regular classrooms? Lists of topics do not necessarily enlighten teachers or students about the content of these topics or what is important. The size of the list of objectives depends on our depth of view and in this case this list kept growing with developments in education every year. The language of these objectives was also getting more formal as different teachers' perspectives and approaches sought to find common ground. Because of the language used our first year students seemed to struggle to know what we meant by these aims and objectives. Teachers in the paper also wondered how we could support student achievement with all these objectives in a 12-week paper given the usual constraints such as time, interruptions and accountability requirements.

Following a professional development workshop with Jay McTighe (McTighe & Wiggins, 2004) the ideas of backward design processes, essential questions and enduring understandings were brought to the professional practice team at an annual meeting. It was decided to replace our list of aims and objectives for PP&I 1 with an essential question and enduring understandings (See Table 1). These

provided a common vision of what is important in this paper for all teachers in the team and identified key messages for us to base our tutorial activities on (no matter what strategies and activities were used by individual teachers in their classes). The intention was to clarify the focus of the paper and the essential understandings. Individual teachers were free to convey these ideas in their own way and vary learning activities across tutorial classes. It was intended that by having an essential question and a list of enduring understandings, new teaching team members could see more easily what was important about this paper. The teachers found that they used the language of these understandings more readily than the list of objectives because the eight enduring understandings were more easily understood and remembered. Students can also more easily remember these phrases and use them to uncover the complexity of teaching and develop their own understanding of themselves, their professional role and responsibilities.

Table 1. The essential question and enduring understandings for Professional Practice and Inquiry 1.

Essential Question: What is a teacher?

Who I am as a person impacts on who I am as a teacher.

New Zealand teachers recognise the unique bicultural context in which they work.

Teachers are responsive to cultural diversity.

Teaching is professional practice.

The classroom is an interactive environment.

Teachers reflect on practice.

Teachers have a sound knowledge of curriculum.

Teachers develop a range of strategies they can apply to learning opportunities and environments.

Knowledge of *The New Zealand Curriculum* begins formally in this paper. *The New Zealand Curriculum* (Ministry of Education, 2007) provided reason for review of what is important for the PP&I 1 teaching team to introduce, explore, and focus on regarding our National Curriculum. In 2007 it was decided that our role was to explore with students the "front end" of the 2007 curriculum; the vision, principles and values, the key competencies, discussion on national curriculum consultation and development, balance, key messages and leaving the curriculum learning areas to other papers.

In 2008 we used the sequence of *The New Zealand Curriculum* (Ministry of Education, 2007) document contents to structure our weekly topics (see Table 2). Because of our existing emphasis on interactive learning environments and the role of the teacher in student learning, a focus on the key competencies seemed a natural fit with our aims and would be an important emphasis. We decided to have a key competency focus week. The principal lecture (PL) focused on the understanding that the aims and content of national curriculum documents do not just appear from

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"above" but grow from previous education experiences and our national and international context. In the PL the students were talked through the history and development of the key competencies starting from the review of the implementation of the previous national curriculum (what was said about the essential skills, Ministry of Education, 2002, p. 58; Hipkins, 2005), the work of the OECD in developing key competencies that were "relevant across different spheres of life and important for all individuals" (Rychen & Salganik, 2003, p. 54), and the alignment with the five strands in the early childhood curriculum, Te Whāriki (Ministry of Education, 1996). Students were also introduced to the dynamics of key competency development through reference to Margaret Carr's work on dimensions of strength for key competencies (e.g. Carr, 2006). A key point made was the wide consultation involved in the development of the new national curriculum document prior to adoption and that curriculum documents reflected what is recognized, valued and aspired to in society. The inclusion of the five key competencies provides a new framework for recognizing and responding to learning (Peters, 2007).

Table 2. The weekly overview of Professional Practice and Inquiry 1, 2007–2009.

Topics 2007	Topics 2008	Topics 2009
	Orientation focus	Teachers as professional and ethics
Introduction to paper: The Treaty of Waitangi Exploring self and idea of partnerships	Introduction to paper: The vision and The Treaty of Waitangi	Introduction to paper: The vision and The Treaty of Waitangi
Planning and preparing for learning opportunities: the teaching cycle	Principles and values	Effective Teachers: Effective pedagogy
Creating effective classroom environments: considering time and space	Key Competencies	Creating effective environments
Planning and preparing for learning opportunities: assessment for improving learning and teaching	Effective Teachers: Effective pedagogy	Curriculum planning: preparing for learning opportunities and the teaching cycle
Creating effective classroom environments: managing learning and behaviour	Managing learning and behaviour	Key competencies

Creating effective classroom environments: grouping learners and thinking strategies	Curriculum planning: preparing for learning opportunities and the teaching cycle	Curriculum design and decision making
The interactive classroom: the importance of questioning, discussions and other strategies	Assessment	Managing learning and behaviour
The interactive classroom: managing learning communities and using ICT as a learning tool	Effective teachers: curriculum design and decision-making	The school and community (This week and the assessment week were swapped to this order due to staff arrangements)
The Treaty of Waitangi: Diversity and similarity	The school and communities	Assessment
Creating effective classroom environments: creating fair and just classrooms	Being professional	Being professional

The principal lecture (PL) on key competencies linked with the enduring understandings number one and seven in the list in Table 1: "Who I am as a person impacts on who I am as a teacher" and "Teachers have a sound knowledge of curriculum". The tutorial added number eight, "Teachers develop a range of strategies they can apply to learning opportunities and environments".

The ensuing two-hour tutorial session focused on understanding the meanings of terms such as thinking, relating to others, managing self, using language, symbols and text, and participating and contributing (MoE, 2007 p. 12), and what these look like in our teaching and when children are learning. After examination of the language and definitions of the key competencies in the curriculum document, the PP&I 1 students worked in small groups to examine photographs of children engaged in activities to identify the key competencies they could see being used and what evidence they had for their observations. We used a technique called STW, which is see, think, wonder (See Figure 1.): What do they see in the photo, what they think is happening and what key competency is being used?

Figure 1. See, think, wonder task for key competency tutorial.

S. T. W.

See - Think - Wonder

Seeing: Observation - what can you see?

Thinking:



Interpretation - what do you think?

- What key competencies are children using in this photo?
- What learning area is integrated with key competencies in this activity?

Justification - what makes you say that?

What is the evidence of this?

Wondering: Questioning Questions I have now.... A question I have is I am wondering

S.T.W.

Great strategy tool for looking at art works, photographs, advertising, cartoons, signs, etc. From Harvard Graduate School of Education, Project Zero resources. Available at http://www.pz.harvard.edu/index.cfm

* This week use S.T.W. to notice and recognise what key competencies students are using, practicing, developing in the photos. In 2009 we changed the order of the weeks to better suit the needs of student teachers working on school placement (the 1½ day per week in classrooms)(see Table 2). The key competencies (KCs) continued in their topic week but we focused more on what each KCs might look like in action and less on the history of their development. We broadened noticing KCs in action to include Carr's dimensions of strength (2006) and what specific KCs looked like at certain ages/stages (for example, what aspects of managing self do five year olds need, teenagers need, and teachers use?). Students were challenged to understand what KC they demonstrate in their roles as teacher education students, being both a student and a teacher (plus their other roles). We continued to emphasise making sense of each of the key competencies along with "noticing" by using the See Think Wonder task. We also added as another strategy that our students could use with older classes, Clarify, Wonder, Puzzle, Predict (CPWP). School students are asked to look carefully at a picture, statement, or image and:

- 1. Clarify–explain to your group what is happening.
- 2. Wonder—ask a question about what is happening or what you want to know, e.g. I wonder why ... I wonder if ... I wonder who ... I wonder how ... I wonder when ...?
- 3. Puzzle–ask a question about something you do not understand or that needs further explanation, e.g. Tell me about ...? What does ... mean?
- 4. Predict-predict what might happen next-think that ... I predict that ...

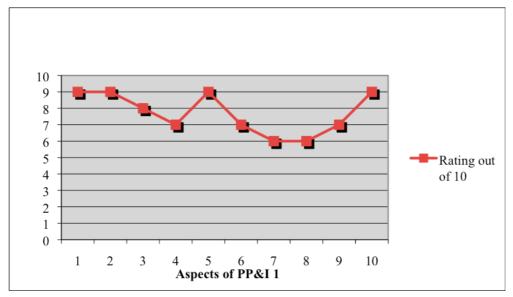
It needs to be noted that at this first year level there was no assessment of the learning about key competencies and the teaching team is currently grappling with the issue of whether KCs should be assessed and how that might be carried out.

There was an expectation that students could apply noticing and recognizing of key competencies in action in the context of any curriculum learning area or activity. From teacher observation and class discussion it seemed that noticing and recognizing the key competencies through matching photographs of student actions to the demonstration of key competencies proved easy enough. However, student teachers felt less confident unpacking the key competencies in a variety of situations and developing activities that would allow children to demonstrate and practice specific competencies. These student teachers struggled with envisaging the key competencies in future practice, and understanding the complexity of planning and implementing the key competencies. Our first year students, it seemed, wanted to simplify the key competencies into items a teacher could use in checklists or with tick boxes—an interesting finding, given that clusters of skills represented in a key competency were formerly treated as discrete skills and the KCs were meant to represent a connectedness between discrete skills.

Student Feedback

For the purposes of this research, in 2009 we collected student feedback on how familiar and comfortable they felt with aspects of the PP&I 1 paper. This was done in the final teaching tutorial, prior to presentations, through a simple rating system (out of 10) for each of a number of specified aspects (see Figures 2 and 3).

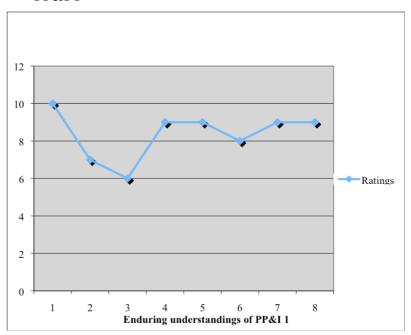
Figure 2. Aspects: Student mean ratings out of 10 of familiarity and confidence levels for aspects of PP&I 1



Key to show students' rating of their familiarity and confidence in the following topics:

- 1. The Treaty of Waitangi
- 2. Effective pedagogy
- 3. Effective environments
- 4. Planning,
- 5. Key competencies
- 6. Curriculum decision
- 7. Managing learning and behaviour,
- 8. The school community
- 9. Assessment
- 10. Being Professional

Figure 3. Enduring understandings: Student mean rating out of 10 of familiarity and confidence levels with enduring understandings for PP&I 1



Key to show students' rating of their familiarity and confidence in the following enduring understandings:

- 1. Who I am as a person impacts on who I am as a teacher,
- 2. New Zealand teachers recognise the unique bicultural context in which they work,
- 3. Teachers are responsive to cultural diversity,
- 4. Teaching is professional practice,
- 5. The classroom is an interactive environment,
- 6. Teachers reflect on practice,
- 7. Teachers have a sound knowledge of curriculum, and
- 8. Teachers develop a range of strategies that they can apply to learning opportunities and environments.

Students told us they felt we had covered *The New Zealand Curriculum* and specifically the key competencies effectively and they were comfortable with their understanding of them and in working with these ideas in schools as first year initial teacher education students. However, they also found that our focus on the Treaty of Waitangi and diversity in classrooms was weaker than for other aspects. These results were surprising as we considered *The New Zealand Curriculum* values statements and the key competencies to be inclusive and support teaching and

learning about the Treaty and diversity. Clearly, from the students' point of view we did not make these links explicit enough. These findings also seem to suggest that focusing our attention on any one aspect may lessen time and effort in other aspects. Perhaps this is obvious in hindsight.

As Brough (2008) suggests the key competencies are more complex than individual skills. Our PP&I 1 students needed more help unpacking the language of the key competencies and strengthening the links between the concepts and practice. Further work by the teaching team in this paper and in collaboration with teachers of curriculum papers is needed to support students linking their understanding of key competencies concepts to planning, catering for diversity and exploration of a variety of contexts. In PP&I 1 we will endeavour to make explicit links to learning areas through broadening our focus from "what" to "what and how". We might also examine specifically the situations and features that would foster the development of key competencies. It has already been considered to introduce the key competencies during our orientation for first years (the introductory phase to teacher education).

There is also potential for teachers to make better use of Macfarlane, Glynn, Grace, Penetito and Bateman (2008) relating Māori traditional understandings of human development with the five key competencies and alignments with Te Whāriki that our mature students who are parents might be familiar with. As a teaching team we can also revisit the approaches to understanding key competencies critiqued in Reid (2006) as part of our review of key competency strategies and activities in PP&I 1.

As pointed out earlier, to date there has been no assessment task for PP&I 1 associated specifically with key competencies. The inclusion of such an assignment was discussed by the teaching team prior to 2009 and remains under review. The main factor is that we are happy with the assignments we currently have and various ideas need to be considered in relation to the aims and content of the year two and three professional practice papers before a decision on assessment is made.

In this paper I have described an example of course review. On the basis of student feedback findings indicate that the use of an essential question and enduring understandings to reflect the principles of this paper provided an effective focus. However, the focus on key competencies, although strengthening students' understanding and confidence in this area, also saw the weakening of their confidence in other areas. This paper illustrates how developments do not occur one at a time and how steps forward can have a mixture of influences that are linked or woven together and impact on the development of course content. The teaching team in the paper, "Professional practice and Inquiry 1" will continue to review the teaching and learning content and activities in light of our own professional development and local and wider change. Furthermore, there is a need for ongoing links with the teachers of curriculum and other papers to achieve greater collaboration over the design and implementation of the ITE curriculum in relation to the national curriculum for schools.

REFERENCES

- Bell, B., & Cowie, B. (2001). Formative assessment and science education. Dordrecht, The Netherlands: Kluwer Academic Publishers.
- Brough, C. (2008). Student-centred curriculum integration and The New Zealand curriculum. SET: Research Information for Teachers 2, 16–21.
- Carr, M. (2006). Dimensions of strength for key competencies. (Working paper). Wellington, New Zealand: Ministry of Education. Retrieved from http://kc.core-ed.net/Resource-bank/Monitoring-and-evaluating/Keyresources
- Delors, J. (1996). Learning: The treasure within. Report to UNESCO of the International Commission on education for the twenty-first century. Paris: UNESCO Publishing. Retrieved from www.see-educoop.net/education_in/pdf/15_62.pdf
- Hipkins, R. (2005). Thinking about the key competencies in the light of the intention to foster lifelong learning. SET: Research Information for Teachers
- Macfarlane, A., Glynn, T., Grace, W., Penetito, W., & Bateman, S. (2008). Indigenous epistemology in a national curriculum framework? Ethnicities. 8(1), 102–127.
- McChesney, J., & Cowie, B. (2008). Communicating, thinking, and tools: Exploring two of the key competencies. Curriculum Matters, 4, 102–112.
- McGee, C. & Fraser, D. (Eds.). (2008). The professional practice of teaching (3rd ed.). South Melbourne, VIC, Australia: Cengage Learning.
- McTighue, J., & Wiggins, G. (2004) Understanding by design: Professional development workbook. Alexandria, Virginia: ASCD Publications.
- Ministry of Education. (2007). The New Zealand curriculum. Wellington, New Zealand: Learning Media
- Ministry of Education. (2002). The curriculum stocktake report. Wellington, New Zealand: Ministry of Education.
- Ministry of Education. (1996). Te Whāriki. Wellington, New Zealand: Learning Media
- Peters, S. (2007). Key competencies: Theoretical viewpoints and possible implications for practice. [TEPS320 Lecture Notes]. Hamilton, New Zealand: University of Waikato, Department Human Development and Counselling.
- Reid, A. (2006). Key competencies: A new way forward or more of the same? Curriculum Matters, 2, 43-62.
- Rychen, S. R., & Salganik, L. H. (2003) A holistic model of competence. In D. S. Rychen & L. H. Salganik (Eds.), Key competencies for a successful life and a well-functioning society. (pp. 41-62). Gottingen, Germany: Hogrefe & Huber.