

# Re-Viewing Practice: The Use of Video Recordings in Learning to Teach

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Authors' Note: This paper is best viewed online at the address above, with the embedded video links.  
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## Abstract:

Inquiry into the affordances of a reflective focus on embodied practice in an undergraduate teacher education program investigated the use of digital recordings of pre-service teachers learning and practising 'core practices' of teaching over time. Using a case study from this inquiry, we argue that reflection on and repeated observation of digital video recordings of practice teaching can support preservice teachers to focus on and improve particular aspects of their practice. We suggest that within a practice-theoretical approach to teacher education, such recordings can effectively support continuing growth towards attainment of teaching competence and expertise, beyond the limitations of generic professional standards, and provide a basis for defensible judgments of teaching proficiency. As real-time complex representations, video recordings ensure that the non-linguistic and relational and affective dimensions of teaching can be evidenced and highlighted for reflection, thus optimising the impact on preservice teachers' professional learning.

## Introduction

The proliferation of e-learning in the higher education context encourages inquiry into how to utilise its affordances to enhance the university components of Initial Teacher Education [ITE]. In what follows, we explore the systematic use of digital video recordings to support the study of teaching practice in university-based preservice teacher education. In the face of international moves that seek to return the governance of content and practice of ITE to education systems (AITSL 2013), schools, and agencies such as the global 'Teach for All' program (Furlong 2013, BERA-RSA 2014), we have argued elsewhere that the contemporary university must remain central to the preparation of new teachers (Reid 2011, Reid & Mathewson-Mitchell 2015). Associated with this is the need for the promulgation of a strong theoretical basis for ITE based on an understanding of teaching as *professional practice* (Green 2009). This is the sort of strong conceptual framework that teacher education needs if it is to redevelop as a coherent philosophical and practical field, and build a strong response to government and media concerns about its quality (Grossman 2008). It is this sort of rethinking that will allow ITE to address critiques that its university-based components are too 'theoretical' and that the best preparation for teaching is school-based (Zeichner 2003, Furlong 2013). It would also allow attention to research evidence that indicates that school-based components of ITE, where preservice teachers ostensibly have the chance to actually practise doing the work of teaching, are too often plagued with "the preoccupation on the part of both mentors and student teachers with immediate issues of practical performance, rather than inquiry into or expansion of a rationale for that performance" (Timperley 2001, p.11).

While policy makers, teachers *and* pre-service teachers (Grudnoff 2011, Smith & Lev-Ari 2005) overwhelmingly see 'the practicum' as the time and place where preservice teachers learn the most about teaching, we argue that its full potential for preservice teacher learning is also constrained and limited by a necessary focus on assessment. When preservice teachers' performance and their potential for improvement in the classroom is always being assessed, they have little room or opportunity to *practise* their new knowledge and skills in a classroom, without being judged. Within ITE curriculum there are very few curriculum spaces

where preservice teachers can ‘play’ (Reid & Wood 2015) or ‘approximate’ the practice of teaching (Grossman, Hammerness & Macdonald 2009) in order to develop their skills *before* their performance is measured against external standards.

On this basis we argue that the university component of effective teacher education should include a process where preservice teachers can begin to acquire both *propositional knowledge* about learners, learning, educational theory, pedagogical approaches and curriculum, and personal *practical knowledge* (Clandinin, 1989) of teaching as a professional practice. School-based professional experience would then more legitimately focus on refining and extending preservice and mentor teacher expertise though shared, targeted inquiry into situated problems of practice in particular contexts<sup>1</sup>.

We are building on the ambitious US projects that have sought to systematically represent and study the classroom practice of expert and novice teachers (Ball & Lampert 1999, Hatch & Grossman 2009, Grossman, Hammerness & Macdonald 2009, Ball & Forzani 2009). Our research, however, situates this work more clearly within the literatures of practice theory and philosophy (Schatzki 2006, Green 2009, Kemmis & Smith 2008, Green & Hopwood 2015) as a larger conceptual frame for ITE. We outline how such a practice-theoretical approach to teacher education might be used in the university setting to support pre-service teachers to take up the subject position of the ‘teacher’ – trying out, trying on, and playing with some of the ‘high leverage’ or ‘core’ practices (Grossman, Hammerness & Macdonald 2009, Hatch & Grossman 2009, Ball & Forzani 2011) of teaching. For Grossman, these are “ubiquitous” classroom practices that assume significance because they “lead to opportunities for learning for both students and teachers” (Hatch & Grossman, 2009, p.77)

Our inquiry has focussed on the development of space within the university components of ITE for the relative safety of a supportive learning community where preservice teachers can both study and practise some of these ‘core practices’ (Reid 2011, Mathewson-Mitchell et al. 2012, Reid & Wood 2015, Lai, Auhl & Hastings 2015). This paper focuses on the use of video technology to support preservice teachers to study and practise ‘being a teacher’ before they enter the professional workspace of the school.

### **The use of video recordings in ITE**

Hatch & Grossman (2009) have convincingly shown how video recordings of teaching, along with other written and multi-media documentation, can be used as the focus for teacher education curriculum. Their work raises important considerations for ITE in relation to rethinking the study of teaching as central to the preparation of new teachers. Highlighting the importance of what they call the “decomposition” of practice—breaking down complex practices into their constituent parts for the purposes of teaching and learning, they remind us of the complexity of dealing with representations of this kind. Firstly:

For teacher educators and the novice teachers they seek to support, these kinds of representations of teaching provide a dual challenge: These viewers need to be able to see what is there and to see what is not; they need to be able to analyze the many elements of teaching and learning that are captured in video and other media, but they also need to have a sense of what those representations fail to capture—crucial details that might be obscured, larger contexts in which work may be situated, overarching purposes, histories, and long-term relationships invisible in daily interactions (Ball & Lampert, 1999). (Hatch & Grossman 2009, p. 70)

Secondly, they note that:

Part of this challenge involves the difficulty of analysing the highly complex practice [such as] leading a rich discussion. Leading a classroom discussion involves multiple components, including establishing norms for participation, assisting students in engaging in careful readings of text ahead of time, and modeling features of academic discourse. [...] If decomposing practice enables novices to “see” and supports them in enacting practice, how can multimedia records of practice illustrate both the fluid

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<sup>1</sup> While this is not the focus of our attention here, a practice theory for teacher education would see attention to preservice teachers’ personal practical knowledge and capacity brought back to the university teacher education in partnership with systems, schools and professional groups (Hatch & Grossman 2009). Building conceptually on the work of Dreyfus and Dreyfus (2004), this would be focussed on developing teacher expertise across a whole career, as ‘initial, transitional and continuing’ teacher education, rather than just at the novice, or preservice stage.

performance and the individual parts that contribute to such fluidity without making teaching seem rote or simplistic? (Hatch & Grossman 2009, p. 71).

What they are pointing to here is what Green (2009) sees as the problem inherent in all approaches to studying practice: that practice is both process and event, as well as a thing. When it is captured for modelling or reflection, its existential properties become essentialised (Biesta 2013), so that using it for teaching about practice means “that representation is being privileged, as endorsed by tradition, and also taken as ‘truth’” (Green 2009 p. 19). This is raised as a central theoretical problem in reference to the relationship between practice and representation. *Any* attempt at ‘capturing’ the indeterminacy, fluidity, and contingency of *any* act of teaching practice for the purposes of holding it still for re-use is impossible. Even the considerable affordances of video recording cannot reproduce reality/practice. It can only stand in for what was actually happening, incompletely, as a representation of it, but unable to actually let us *be* in it again. As Green (2009, p.16) questions: “In what sense might we speak of knowing practice – of the knowingness in practice, as well as the activity of knowing itself, regarding practice? How do we know practice?”

For Green, this leads to the problem that in “such a representationalist view, knowledge precedes and predetermines action” (Green 2009, p.17). Knowledge is therefore made separately from, and with priority over, practice, and marked in the discourse of ITE which prioritises ‘reflective’ (mindful) over ‘non-reflective’ (embodied) practice (Zeichner 2008). The connection between these ideas and Schön’s (1983) concepts of ‘reflection-on-action’ and ‘reflection-in action’ in the development of expertise is important here. For Schön, (1992, p. 53), “Artistry [...] is not only in the deciding but also in the doing.” This highlights the interrelation of ‘mind and body’, ‘theory and practice’, and as Green suggests “In such a view, representation is part of practice, within it, implicated in it, rather than being set against it” (Green 2009, p.19)

As things that ‘capture growth’ (Bannink 2009), though, Hatch and Grossman remind us that even as objects in themselves, video-recorded representations of practice must be treated carefully:

Records and representations of practice vary considerably in terms of “grain size” [...] from those that focus on short segments of classroom interaction (like those used in “microteaching” analyses) to those that address entire courses or a year or more of teaching (Hatch & Grossman 2009, p. 71).

Our major focus in this paper is on the use of digital video recordings to support ITE students to see and understand what they are *doing*<sup>2</sup> at the finely granulated level of the body. This was an attempt to study the effects of a regular flow of video representations as *part of* the practice of learning to teach, within, and as part of, ‘an adequate theory of practice’ in Green’s formulation. Other research into the use of video recordings in ITE has shown them to be effective in assisting preservice teachers to develop a rationale for their performance, as advocated by Timperley, above (Turney et al. 1975, Brophy 2004; Ball & Lampert 1999, Rich & Hannafin 2009), as well as in assisting them to develop skills (Turney et al 1975), inquire into, and begin to reflect on their actions as they take up the identity position of teacher (Schieble, Vetter & Meacham 2015), and for purposes of assessment (Bannink 2009).

We re-make the case for their value in professional learning by drawing from digital data collected during our longitudinal inquiry into the utility of practice theory in teacher education (Reid 2011). We present and analyse video recordings made by one preservice teacher, to whom we have given the pseudonym “John”. Our analysis leads us to argue that by taking seriously the need for preservice teachers to attend to practice in this way, ITE curriculum can encourage them to think beyond the codification of teaching practice, for example, in the national professional standards for Graduate Teachers. It can provide opportunities to explicitly study, understand, critique *and* innovate on practice as an object of study in its own right. Such a focus will prepare them for ongoing professional learning through approaches such as lesson study and learning study (Watanabe

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<sup>2</sup> What their bodies look and sound like, what their faces, words and gestures convey, how they relate to a group of learners and how those learners respond to them as teacher – whether what they do could be done differently, whether their words and actions, and the effects they create, could better help them relate, demonstrate, explain or create a mood in a teaching-learning exchange.

2002, Lewis, Perry & Murata 2006. Hatch & Grossman 2009) reinforce that aim to improve classroom teaching, and can be seen as working in congruence with the emerging field of practice theory and philosophy. Darling-Hammond, Jaquith and Hamilton (2012) have argued for the value of such work in conjunction with professional standards for teaching:

The term ‘practice theory’ is used to denote a broad epistemological tradition that is concerned with how things get done in everyday life. In exploring the possibilities of a focus on practice for ITE, we have particularly drawn on concepts of practice and the body from Bourdieu (1977) and Schatzki (2002), as mediated for professional education through the work of Green (2009), Kemmis & Smith (2008) and others. Of most significance is how, in Britzman’s (2002) sense, ‘practice makes practice’ – and how practice *produces* practitioners in and through regular participation in its always unpredictable unfoldings.

### **Practice theory and practice-based approaches to teacher education**

The study we draw on here aimed to investigate the affordances of practice theory as the basis for undergraduate teacher education curriculum reform in a large university in regional Australia. Over a three-year period it involved consecutive cohorts of First-Year preservice teachers, along with expert teachers, academics, as well as final-year preservice teachers, in an action-research program designed to develop empirically-based understandings about how students gain practical knowledge and develop expertise. Framed as the *Study of Teaching*, the project examined the effects of a program of integrated, extra-curricular activity that sought to test and refine a way that our pre-service teacher education courses could be re-shaped to encompass a small set of ‘core’ or ‘high leverage’ practices of teaching, as identified by researchers in the US (Grossman et al. 2009, Ball & Forzani 2009). Building on Bourdieu’s (2005) discussion of forms of *habitus* that are situated and shared by particular groups of practitioners, and on existing post-structuralist inquiry into teacher education as a site for the formation of a particular kind of (teacher) subjectivity (Britzman 2002, Green 2009, Green & Reid 2004, 2008), as well as on post-structuralist understandings about the development of embodied expertise (Dreyfus & Dreyfus 2004), the *Study of Teaching* project worked with this theory to explore an approach to make the enacted, embodied, practice of teaching the object of inquiry (Reid 2011, Mathewson Mitchell & Reid forthcoming, Lai et al. 2015).

The use of digital recordings was a crucial aspect of this study, and weekly recordings were made that allowed preservice teachers to view, review and reflect on their own and others’ ‘real time’ practice as embodied, relational *performance*, situated in the material particularities of time and space (Schatzki 2002). We focus here on recordings of just one student, John, and on just one key routine that we identified as a ‘core practice’ for primary teachers – the practice of ‘shared reading’ (where teachers read aloud and discuss a book or text with their pupils). We go on to show how his embodied knowledge and capacity to successfully orchestrate developed and deepened over the course of his first semester. By the time John was scheduled to enter his first school placement later that year, it was clear that this program of regular weekly group study and practice of teaching had already supported the development of a teaching *habitus* that would allow him to make optimal use of the opportunity to learn in the classroom setting.

For Bourdieu (1977, 2005), *habitus* is a set of unconscious and embodied dispositions, attitudes and capacities that people develop in and through social practice. As Dreyfus and Dreyfus (2004) suggest, such embodied, unconscious capacity allows the new practitioner to give more conscious attention to addressing immediate and unpredictable problems of ‘doing’, ‘saying’ or ‘relating’ to individual and collective bodies of students that continuously emerge in the unfolding of classroom practice (Kemmis 2009). Adapting how and what the teacher body can already do and say, with each repetition of practice, and adding this to the store of embodied experience, is what allows a practitioner to expand the repertoire of practice that they have ‘ready to hand’, as ‘expertise’. With the support of a mentor or supervising teacher in a school setting, and a *habitus* that already allows him to perform just this one core practice as a well-rehearsed repetition rather than an initial performance, the preservice teacher is already predisposed to think about his practice in dialectical relationship with its performance. This attitude allows him and his supervising teachers to see the school setting as a site for the situated ‘study of teaching’ and work to improve those elements of his practice that would need experiment and refinement for different contexts (Dreyfus & Dreyfus 2004).

Many forms of Practice Based Teacher Education (PBTE) provide examples of how the nexus between practice theory and teacher education might be explored (Grossman et al. 2009; Ball & Forzani 2009; Furlong 2013), and most of the body of related research recognises that, despite widespread beliefs to the contrary, teaching is actually ‘unnatural’ work (Ball & Forzani 2011). Although novice teachers clearly need ‘knowledge’ *about* teaching and learning, knowledge without practice is insufficient to allow them to develop capacity. Similarly, practice alone is insufficient without attention to the underpinning theoretical and propositional knowledge (Zeichner 2012). This is essential for the reflection and critique that suggests the possibility of change. Practice theory as a framework for ITE provides the resources for the evolution of strong and responsive teacher education practice that brings together school and university academic and school-based knowledge, teacher educators, teachers, preservice teachers and students, with a shared focus on understanding and researching professional practice (Green 2009).

In the next section, we move on to briefly describe the *Study of Teaching* program. As noted above, the study set out to understand whether, and how, focussed repetition and practise of a small set of ‘core’ teaching practices, transferrable across settings, might assist our students to make better, more integrative connections between the ‘theory’ provided in their campus-based foundations, curriculum and pedagogy subjects and the particular ‘practice’ settings in which they must use and orchestrate this range of propositional knowledge as they first perform themselves as teachers. Our assumption was that it would be beneficial for preservice teachers to be supported to learn what it ‘feels like’ to take up the subject-position, or identity position, of teacher (Pietsch et al. 2011, Schieble, Vetter, & Meacham, 2015). In line with Grossman, Hammerness and Macdonald (2009), we were concerned that this should happen *at the same time* as they were being exposed to the foundational concepts and theories about education and teaching. As Dreyfus and Dreyfus (2004) suggest, if they have already practised, ‘mastered’, and ‘inhabited’ (Mathewson-Mitchell & Reid 2015) some of the embodied ‘doings, sayings and relatings’ that characterise the teaching *habitus* before they extend their performance to their (assessable) school placements, they will be able to learn much more from the placement. They will be better able to use their time in schools to build new iterations of practice into their existing repertoires of experience in ways that allow them to move beyond the limitations of Lortie’s ‘apprenticeship of observation’ (Grossman, Hammerness & Macdonald 2009).

### **Practice-theoretical research in teacher education: Study of Teaching**

*Study of Teaching* was a sixteen-week extra-curricular offering introduced in the first year of a four-year undergraduate Bachelor of Education (Primary) program. The first iteration of the program was introduced as a course requirement for all students, who were also invited to volunteer as participants in the study. Following Grossman’s (2009) model, the ‘core practice’ of reading aloud and engaging primary school pupils with text was selected as an initial focus. A conventional action-research methodology (Kemmis & McTaggart 1982, Kemmis, McTaggart & Nixon 2013) was used, with three different Action Groups working across three campuses, each planning and implementing slightly different approaches as independent research cycles in their own contexts (Mathewson-Mitchell, Hoare & Reid 2012, Edwards-Groves & Hoare 2012, Daniel, Auhl & Hastings 2013, Edwards-Groves 2014).

Approximately sixteen university and school-based staff and over 200 students were involved across the whole project. With regular weekly campus, and monthly cross-campus reflection conversations across the research team, *Study of Teaching* provided a unique opportunity for inquiry into the impact and effect of this experience on pre-service teachers, through the regular action-research cycle of reconnaissance, planning, implementation, observation, and reflection (Kemmis, McTaggart & Nixon 2013). Each action cycle included three-weekly feedback from students (Pietsch et al. 2011) and the iterative planning could therefore be built on reflection from participants in both corresponding (synchronous) and previous cycles. In all, there were ten full action-cycles over the period 2011-2013, four of which followed the first group of students on one campus through into subsequent semesters and years of their course (Reid & Wood 2015, Lai, Auhl & Hastings 2015). Although not the focus of our attention here, more formal evaluation of the program was carried out in student focus groups, and independent cohort comparison of school-based supervising teachers’ assessments with those of students in previous years (Mathewson-Mitchell, Hoare & Reid 2012).

In the first action-cycle, in which this data was gathered, students attended the program for four hours each week in addition to their other classes<sup>3</sup>. In each of the 12 weeks of Semester 1, with the focus on the core practice of shared reading, demonstrations of expert practice in reading aloud and leading discussion about the text were provided. These were followed by opportunities for students to ‘de-compose’ (Grossman, Hammerness & Macdonald 2009) those exemplars with an expert teacher mentor, and then attempt to ‘approximate’ aspects of the practice themselves, with immediate feedback and coaching. Across the first Semester, students had nine (9) opportunities to practise a fully orchestrated performance – preparing, presenting, and responding to feedback on their planning and management of the core practice of ‘shared reading and discussion’. Each student was given time to prepare for and then present and discuss nine different books with their peers: three books that they deemed suitable for use in Early Primary settings, three for Middle Primary, and three for Upper Primary. They then had four more weeks of practice with children in a local pre-school, before they commenced their first formal school-based professional experience placement in Semester 2.

Each week the two-hour session followed a similar format: identifying the key strategies and approaches recommended for the target age- group of pupils the shared reading practice was aimed at; reflecting on educational theory and knowledge relevant to this context that had been provided in the academic curriculum; providing an expert model demonstration; breaking down – ‘de-composing’ – the expert practice just observed with structured explanation of how and why particular things were ‘done’, or ‘said’, and reflection on their effects; re-modelling specific skills; and giving student teachers the opportunity for immediate (sometimes ‘choral’) practice of the demonstrated skill with expert mentor coaching, peer and mentor feedback. The expert teachers guided the preservice teachers to observe, describe, and reflect on the component parts of the ‘demonstrations’, both those that were presented ‘live’, or those that provided as supplementary video- clips of the same practice enacted by professional actors, writers, performers or other teachers. In the case of video examples, the ‘de-composition’ relied on observable aspects of practice, and shared speculation about ‘why’ the practice had unfolded in a particular way, without opportunity to access the thinking underpinning and informing the performance. This focus on what practice ‘looks like’ in each particular representation provided an important understanding of the effect of context and philosophy in observations of practice, and how core practices, though sharing key ‘family resemblances’, are rarely replicated exactly from time to time. Students were then given time to think about (‘imagine’ themselves doing what they were trying to do), ‘have a go’ at, practise, and refine their own performance of some of the ‘component parts’ of the practice they observed<sup>4</sup>. Within small ‘working’ groups, the preservice teachers could rehearse the particular embodied movements, forms of address, voice tone and pace, and handling of material objects to achieve the quality of performance observed in the practice being studied.

In this first Action Cycle it was significant that this practice did *not* occur in a school classroom, where, as Timperley (2001, p. 111) claims, performance anxiety can cloud the opportunity for student teachers to move very far at all beyond the level of minimal “performance competence” (Timperley 2001, p.111). This Action Cycle placed preservice teachers in the ‘safety’ of a small peer group where there was no summative assessment of their performance and no consequential effects on ‘real’ pupils for the freedom to use trial and error<sup>5</sup>, but a clear expectation of the quality of practice that was demanded. The notion of ‘upping the ante’ was used to each week to increase the expectations of the standard of ‘teaching’ that were deemed satisfactory. *Study of Teaching* meant that mentors could interrupt with immediate, on-the-spot, ‘just in time’ feedback about a particular movement, gesture, tone of voice or mode of response, which could be immediately rehearsed and re-integrated into the flow of the practice itself. They could explain, for instance, why and when a general invitation might precede a focussed request or command, or why the introduction to a book for kindergarten should include discussion of the author and illustrator.

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<sup>3</sup> All students in this Action Cycle attended a compulsory, two-hour, whole group session, held after school hours (4-6pm) each Tuesday. They were also timetabled for a further two-hour small group session later each week, supported by a final year student mentor, for reflection on their previous performance, planning, preparation, and rehearsal of the material they would present in the next Tuesday session. Small digital Flip Cameras (one per Sharing Group) were used in the first years of the project, though from the beginning some preservice teachers were able to use their own mobile phone technology for recording, and this quickly increased over time

In a second weekly session, the preservice teachers then had the opportunity each week to plan, practise, rehearse and coach each other, as peer colleagues, with a final-year student mentor, before they combined with members of two other Working Groups for practice ‘performances’ in larger Sharing Groups at the beginning of the next week’s *Study of Teaching* session. This was the point at which each group would deliver their practiced ‘lessons’ to the others, and record them using a digital video camera, for later review and reflection.

### Using digital video recordings for the Study of Teaching

Every one of each preservice teacher’s nine practice performances was recorded digitally. They were not collected or evaluated by us. The recordings were made by a member of the Sharing Group, filming from the point of view of a ‘pupil’ in the exchange. The video recordings were re-played immediately after the performance, for the members of the Working Group to see themselves while the other members of the Sharing Groups and their mentor teachers provided them with structured, feedback and evaluation focussed on the same aspects as had been discussed in the expert modelled performance (Daniel, Auhl & Hastings 2013). Written feedback sheets were provided to all preservice teachers for this purpose, and each member of the Working Group was able to immediately transfer the digital video recording to their own computer, or email it to themselves, for their own, individual reflection using the same reflective scaffold (See Figure 1, below). As noted above, this process was repeated nine times over the research cycle, so that the preservice teachers became very familiar with both the ‘parsed’ rules that had been demonstrated to govern the practice of an expert practitioner, as well being introduced to the professional metalanguage that has been incorporated into formal standardised national assessments of teaching at the Graduate Teacher level (AITSL 2013).

**Figure 1:** *Study of Teaching* Reflection Guide

<b>Present/Observe/Reflect/Feedback</b>	<b>Study of Teaching</b>
<ol style="list-style-type: none"> <li><b>Present:</b> demonstrate to your groups the teaching session you planned and practiced during your small group time. You will have 15 minutes to do this – your mentors will stop and coach you during the session and stop you even if you are not finished after 15 minutes.</li> <li><b>Observe:</b> you will be given a focus point to watch for. Only focus on this. Think about what you can offer as feedback. Think about how the group achieves this aspect – you may see it in only one member or in all. Make short notes but also try and remember.</li> <li><b>Observe: video:</b> use the video to capture the presentation for viewing. Focus on the individual talking at any one time. The rest of your group will be taking notes on other aspects.</li> <li><b>Reflect:</b> this is time to plan your feedback– when you huddle [come together as a group], bring together your ideas and prepare to give concise information: what will you say, which points are most important. Add points to your feedback sheets and decide what it is you want to tell the presenters. Focus on the aspect you were looking at. Video group – choose a still to share with the presenters that shows them something you want to comment on, about facial expression and body language.</li> <li><b>Feedback:</b> this time needs to be brief and direct- and focus on the skills of teaching that we are practising here. Focus on giving feedback constructively. You will only have 3 minutes to give your feedback – quick, clear, focused. Presenters will then receive 3 different feedback comments.</li> </ol>	<p><b>‘present, observe, reflect, feedback’</b></p> <p><b>Communication skills</b> (use and effectiveness of eye contact, facial expression, body language, voice -including expression, pause, pace, clarity, gesture and presentation of book)</p> <ul style="list-style-type: none"> <li>●</li> <li>●</li> <li>●</li> <li>●</li> </ul> <p><b>Teaching skills</b> (preparing group for reading, using questions to engage attention, focus attention on meaning, predict events in the text, clarify meaning, check understanding, redirecting questions)</p> <ul style="list-style-type: none"> <li>●</li> <li>●</li> <li>●</li> <li>●</li> </ul>
<p><b>Please provide your group’s written comments on the back of this sheet and hand to the teaching group to keep with their records.</b></p>	

Several of the preservice teachers in this Action Cycle had volunteered to participate in the research data collection by providing us with their weekly digital video recordings, and, as one of these, John was selected as an interesting ‘case’ for us to follow, on the basis of a comment he had made anonymously in the first of the three-weekly individual evaluative reflections on the program. This was that his wife had complimented on how much his children had been enjoying their bedtime stories with him since he started the course. He had noticed the difference in how he was reading to them, too, and identified himself after that session, to say that he really thought it was ‘paying off’ for him, after only three sessions. At the completion of the program, we approached John individually for permission to use his recordings in research presentations, and once that permission was obtained, we have been able to trace through his weekly video-recordings the development and consolidation of that change, and what might well be the ‘pay off’ for him in terms of what we see as a powerful teaching *habitus* that allows him to go beyond ‘performance competence’ in his teaching practice.

### **Developing expertise: a (case) study of two videos**

John was in his mid-twenties when he commenced his ITE. To examine the development of John’s teaching *habitus* over time, we draw on two of the digital recordings created weekly during the *Study of Teaching* program. These are taken at two key points, at the start and end of the first action-cycle. John used the first recording and the reflection guide in Figure 1 as the basis for planning his second iteration of the shared reading practice. He used subsequent recordings in the same way, and his peers considered that the final recording indicated his readiness to undertake his first school professional experience placement. Our analysis is based on transcription of the recording, and close dialogic reading of the transcript and visual texts in concert, noting evidence of the focus gestures, tones and interactions on the reflection guide presented in Figure 1 as well as other dimensions of the core practice that we had highlighted in *Study of Teaching*.

The first recording captures John reading a storybook to his peers in the sharing group context described above. This constituted his first ‘go’ at reading aloud in the role of ‘teacher’ rather than ‘parent’. The recording is 2:28 minutes long, and can be viewed here. <http://www.fusion-journal.com/re-viewing-practice-the-use-of-video-recordings-in-learning-to-teach/>

This recording has John clearly at the centre of the frame, and the viewer is positioned as a member of the Sharing Group with whom he is sharing this book. The recording was made in Week 3 of the program. In Weeks 1 and 2, the preservice teachers had engaged in introductory activities, been given an overview and introduction to the *Study of Teaching* program and its research dimensions, formed working groups with their mentor teachers, and been prepared for the process, through rehearsing and performing a popular Australian ballad as a choral presentation. To familiarise themselves with the digital cameras, and the reflection process, this was recorded, and different renditions were played back to the whole group to model the type of feedback and metalanguage that is most useful in supporting reflection on the practice observed.

The digital recording provides us with significant visual and auditory data in relation to the capacity of this student to take up the position of teacher and ‘inhabit’ a ‘teacher-ly’ body as he reads aloud to his Sharing Group audience. In this recording, John appears relaxed, and is dressed casually, consistent with the ways that preservice teachers normally dress to attend classes at this university. John is an enthusiastic and engaging young man, who smiles often throughout the reading, effectively ‘relating’ to his audience through his capacity to project himself as confident and at ease in this situation, even happy to be sharing this book with us. He appears very familiar with this story, and attempts early in the interaction to establish a connection to his audience:

<p><b>JOHN:</b> <i>Opens the book, pointing to marks on the page on page 2, addresses audience:</i> It has pen marks from my children...</p>
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There is a constant use of facial expression at appropriate times within the story, and John uses his voice very effectively in different ways, varying his tone, speed and volume as the story demands. Hand gestures are also used for emphasis related to the text, though he uses only a limited range in this reading. There is a constant referral back to the text and he makes effort to look at the audience. There are some points where commentary is evident, and although this is limited and tends to be literal, it is a clear strategy of ‘relating’ to his audience.



There are also some awkward moments, particularly at the end of pages. There is no questioning of text or acknowledgement of illustrations that were contradictory to the text.

This example illustrates John's first 'practised' effort. Like all the preservice teachers, he has not entered the course *tabula rasa*. He already has considerable embodied experience and knowledge about sharing the pleasures of a story-book from reading aloud to his own children, and he has clearly identified the strategies that have been modelled and discussed and is applying them in this situation. He marks the start of the teaching event clearly, e.g.:

**JOHN:** [...]

Looks at audience: *My Aussie Mum*

It appears that this reading is well rehearsed. Each movement, each utterance, has been thought about in a very conscious way. In this sense his efforts are effective and engaging, although also clearly self-conscious, and what is missing is the smoothness or flow that we sense would characterise his reading at home with his own children, and would be evident in a teacher who draws on multiple and varied instances of reading aloud, and strong theoretical knowledge about helping children learn to read. This missing element is obvious when viewing the digital recordings with a focus on the embodied performance of this particular teaching practice. It is made obvious in the transcripts that are based on viewing of the digital recording through attention to the body in the approach to transcription. However, without the digital recordings as a reference point, and as evidence, these aspects of practice would be long forgotten or not noticed, certainly as part of a developing approach to teaching practice,

In the second example, recorded three and a half months later, John is practising to introduce a different book, outside the safety of his university peers, to a group of children he had not met previously. Here he is introducing a book to a group of children at a local childcare centre. This was John's first 'live' shared reading experience, and his first time in the role of teacher, in a professional context.

The second video, at <http://www.fusion-journal.com/re-viewing-practice-the-use-of-video-recordings-in-learning-to-teach/> shows John at work: practising as a teacher, and it is clear that his practice does have consequential effects for the children to whom he is responsible in this exchange. The recording was made by another member of his Working Group, seated behind the children, while the other two members made their individual notes on the Feedback sheet (figure 1, above). The recording lasts for 14:38 minutes, and the final seconds show the children thoroughly engaged, moving forward to point out information on the page, and comment about it. In this sense, it has been a very successful shared reading session – and although of course not yet expert, it is clearly a 'better' performance than the first recording, and certainly shows that he is already more than competent in performing this practice.

We have analysed only the interaction that occurred in the same time span as the first recording, approximately two-and-a-half minutes. In this timeframe, the shared reading does not move beyond the introduction and first pages of the storybook, as the introduction took far more time than in the previous reading. This is because John's practice can be seen as far more elaborated, educative, and responsive, actively attempting to engage his audience with the meaning of the text through direct comment, body language, and expression, all of which are demonstrated as he spends time discussing the front cover.

**JOHN:** Well, *pause* we're going to read a story about a witch, but she's a *nice* witch *leaning towards students and smiles* and she's a bit funny too. So we don't need to get scared, do we? *shaking his head exaggeratedly and smiles*. No. *Turns book around to face the audience, and holds the cover up*. Okay, so this story is called 'Witchy Goes Shopping'. Has anyone read this story before?

**All girls chorus:** No.

**JOHN:** No, *pointing to the front cover she's got a funny black cat as well doesn't she?* *Moves to open the book*

**Girl 1:** Yes, it has long ears.

**JOHN:** *ceases turning back the cover and keeps focus on the cover... It does. And pointing it's got scraggly fur too. But let's see what happens pauses when witchy goes shopping opens the book and holds pages open. Can everyone see?*

In this example, John is dressed up, wearing a short-sleeved buttoned-shirt and jeans, appropriate for this setting and showing an awareness of the presentation of the body. Throughout the reading, there is constant interaction and questioning for the purpose of connection with the story. The book itself is not disclosed until the preliminary conversation is complete, as a developed strategy to draw students in. In the preliminary discussion, John attempts to draw on the children's previous knowledge to set the scene. When he starts to read the book, he is increasingly aware of the perspective of the children: he invites children to sit; he checks that they can see; and, he allows wait time for children to speak. He is responsive to their ideas and even in these first few minutes he is able to interact with more 'ad-libbing' than in the first example. What is also different is the learned, teacherly, behaviour of his interruption of the reading to point out parts of the text and illustration, and to allow children to do so also. There is increased eye contact and the use of gesture to emphasise the meaning of both visuals and text. There are opportunities for the children to contribute their ideas and multiple points of affirmation of both discussion and behaviour.

While not transcribed here, the recording shows that at points where the discussion veers away from the book, John draws children back, managing the interaction. He also revisits earlier discussion as the story proceeds. In addition, while encouraging individual engagement, group engagement is created through requests for students to answer together. The environment itself is different from the quiet classroom used on campus. There is a lot of background noise here, with doors opening and closing, and other children moving around playing. Physically, John uses his body more than in the previous example. He leans forward toward the children at times and changes positions to see different children and is able to vary the placement of the book, which he holds comfortably in one hand so that he can turn the pages with the other, while previewing what he is to read. He is aware of the position of children and repositions the book so children can access it more easily.

This recording evidences a more developed and integrated practice than the first and the second examples. There is a sense here that John is developing a teaching *habitus*, so that he is at ease with his body, and more conscious of his practice than himself as performer. He has practised the 'rules' about reading a book to beginners, and while some of these may not yet be habitual for him, he can nonetheless already move beyond a simple practice schema to also integrate other areas of knowledge and skill. For example, he manages the movement and contribution of children and draws on previous experience, while focusing on the text and the visuals. He likewise uses his body in intentional ways, moving beyond just simple gesture. These elements of his practice suggest increasing complexity and an ability to manage multiple aspects including the materiality of the book, the content of the book, student interactions and responsiveness. Such developments suggest that John has made good use of the structured feedback and reflection process of *Study of Teaching*, and appears to have developed a capacity to reflect on what is and is not effective in his own practice and to plan and enact changes that improve practice – following his own cycles of action research with the members of his Working Group.

Importantly, this latter digital recording, and its situatedness in a professional setting with children, highlights questions of context. The context of the practice is evident in all of the recordings. These changing contexts can be identified and analysed as part of the action of analysing the examples, to provide an understanding of the context of teaching. Importantly, the digital recordings also capture the interaction involved and the use of the body so that the interweaving of activity, experience and context, in Green's sense (2009, p. 7), can be examined. Looking at these recordings on multiple occasions allows John, and others, to identify different aspects of the practice in acts of ongoing decomposition that draw on understandings of what it feels like to engage *in* the practice, along with understandings of the theoretical aspects of teaching *as* practice.

## **Conclusion**

As we noted at the outset, we are interested in the affordances of video technology to promote careful attention to the practice of teaching for ITE. In this paper we have examined the idea of using video to study

the fine grained, embodied ‘doings, sayings and relatings’ that enable teachers to enact the practice of teaching. We see this as a means of addressing current perceptions that university-based components and school-based components of ITE curriculum represent a divide between theory and practice. Contemporary policy requirements for graduates to have up-to-date knowledge of practice and a capacity to investigate what is, and is not effective in their own practice (TEMAG 2015) support the need for rethinking preservice teacher education curriculum along these lines. We have suggested that, within a practice-theoretical approach to teacher education, as evident in the *Study of Teaching* program outlined here, the use of digital video recordings can effectively support continuing growth towards attainment of professional standards and provide an evidenced basis for defensible judgments of teaching proficiency.

In using digital recordings as an integral part of the *Study of Teaching*, we identified the importance of moving beyond static and paper-based representation of professional practice to engage with what Grossman, Hammerness and Macdonald (2009) have called “pedagogies of enactment”. Through the use of guided reflection on digital recordings of themselves, students are able to see themselves ‘doing, saying and relating’ as teachers, as they examine their enacted practice of teaching as an object of inquiry. Through recording their own approximations of practice with expert mentors, they are also able to reflect on their involvement in the act of teaching and those of their peers, to learn through their own engagement in practice. Within a practice-theoretical approach to ITE, the affordances of digital recordings are seen as useful participants in the dialogic exploration and study of teaching, as an embodied, relational, and situated practice.

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