

CPD and Video: a growing infatuation

This article explores the increasingly important role of video in teacher professional development. It considers three different types of video: the traditional training video, classroom observation video and the approach to video taken by Teachers TV over the last five years. It looks at some of the existing research into impact and effect of video use and argues that a more creative and flexible approach employing the best of television standards could be a powerful tool for drawing in the reluctant majority who are slow to improve into a more sustained engagement with their own professional development.

There is something compelling about seeing a teacher teach. For so long teaching was a solitary business. It was something that went on behind closed doors. Just once in a while an inspector may look in but the experience was usually so unnerving that it confirmed the predilection for keeping the door firmly closed to all comers. But things are very different now. Non-threatening classroom observation plays an increasingly important role in professional development with teachers and school leaders encouraged to watch each other and to engage in analysis and evaluation. However, organizing regular observations can be time-consuming and logistically challenging, which is one of the reasons for the growing role that video is starting to play in Continuing Professional Development (CPD). Ready access to digital formats, and the ease with which video can be made available via the internet, has meant that using video has become an increasingly prevalent phenomenon. It is therefore worth considering just what the benefits of using video in CPD are, what research tells us about its effectiveness, and whether video could be the magic ingredient that helps to engage the reluctant majority of teachers who have yet to embed professional development and continuous improvement into their working lives.

Initially, we need to clarify what we mean by video in the context of professional development. While its use may be increasingly prevalent there are at least three different models. The first is the longest serving genre, generally described as the "training video". These are carefully constructed videos, usually commissioned by government agencies, which demonstrate a particular strategy or approach that the agency would like to see disseminated. Generally they are professionally produced and tend to show exemplary practice in exemplary situations.

The teachers and the classes that feature in these videos have been very carefully chosen, the practice has been scrutinized and any departure from the prevailing orthodoxy has been edited out. In the past they were distributed as VHS tapes, then DVD's and now, many of them are appearing on training websites.

A good example in England would be the videos commissioned by the National Strategies. They were used widely in the implementation of the Literacy and Numeracy strategy. Those strategies were in themselves successful in raising attainment and supporters would claim that the videos played their part. It is more likely that it was the impressive bank of resources that were made available for teachers to use in the classroom and the clear structures that were imposed, that lead to the impressive improvements in outcomes. To get a flavour of this kind of video go to the National Strategies website where content from the wide range of training video produced have been cut up into short clips. Both the

National Strategies and what used to be the QCA still have catalogues of training DVDs which conform to the 'training video' model.¹

Whilst used by some, particularly in formal training situations, these training videos are rarely greeted with much enthusiasm by the intended audience, who find them unrealistic and overly staged and bearing very little relation to the classrooms they work in. In almost all cases these training videos were informed by a top-down transmission approach to professional learning. Not surprisingly, there is little evidence that this type of video was having much impact on teachers' practice. Indeed, many head teachers still have unopened boxes of them on their bookshelves. It is not surprising that this form of video has failed to connect, because it embodies a top-down transmission model of learning where most research now seems to suggest that a collaborative peer-to-peer model that stimulates reflective learning is far more effective in changing teachers practice.

The second type of video used in CPD is raw observational footage of the teaching process. This is where video is used to record classroom activity as it happens. Often this is for the participant teacher to analyse, either on his or her own, with a mentor or with colleagues. This sort of video is usually rough and ready, generally filmed by non-professionals using the increasingly accessible domestic digital video technology. In some schools there are even specially equipped teaching rooms with fixed cameras and a viewing suite.

The technical standards (particularly in the quality of sound recording) mean that while this raw observation can be shared with colleagues it is rarely suited for wider distribution. It also raises issues of confidence and confidentiality. The participants are vulnerable and their pupils can be exposed to unhelpful scrutiny.

Nevertheless this model is becoming increasingly prevalent as part of embedded CPD, primarily because it is based on a peer to peer model, it asserts the priorities of reflective learning and it is self-evidently authentic. The rough and ready production style emphasises the reality of the situation. This is a classroom you recognise and even a teacher you know. For this reason it serves as a catalyst for analysis and often helps lead to collaborative change and improvement. It feeds well into the growing interest in 'action research' as a dynamic ingredient of higher-level professional development. When linked to the culture shift created by YouTube and the concept of User Generated Content, the issues of confidentiality notwithstanding, it also resonates with the growing interest in the wider dissemination of this sort of video via video sharing sites and social networks.

This 'observational research' approach to using video in teacher professional education has also attracted the attention of educational academics and researchers. There is a considerable body of research into this type of video and its use in the professional development of teachers. I will consider some of this research, later in this article. What is clear is that this use of raw classroom footage for both teacher training and professional development seems to assume a structured experience involving an intermediary and is only very rarely used by teachers for their own personal development. To find video that is being widely accessed for individually motivated professional development we need to look at the third model.

¹ For a list of typical titles search the National Strategies under DVD. Examples would include: *Sample Lessons on Assessment for Learning: Whole School Training Materials*.

The third type of video has been developed over the last five years by *Teachers TV*. Initially founded as a television channel dedicated to sharing good practice in teaching and learning and school improvement, it is now distributed widely via a sophisticated website. From the outset, video on Teachers TV combined the professional approach to production of the original training video with the raw observational approach of classroom recording. This mixture is further enriched by the demands of broadcast television. In this arena it is not enough for a video to merely explain and transmit, nor is it enough for it to be authentic. It also needs to utilize the best of television production expertise to engage and inspire its audience. And discipline of broadcast means that all videos have to meet high quality standards in relation to picture quality, sophisticated editing that illuminates and engages and perhaps most important of all, high-quality sound. This level of professional production also includes the highest possible levels of compliance: with both pupils and teachers fully aware of what is being filmed and how it will be distributed.

The fundamental change here is that the video is enhanced through the creativity and discipline of broadcast programme making. It so much more than the raw experience: it has context, it has analysis and above all it has narrative. Appealing narrative is the key to engaging the viewer, and, I would argue the key to effective CPD. To achieve this engagement Teachers TV makes use of established broadcast formats such as the make-over format that has become the staple of popular television.

In the series *From Good to Outstanding*², for example, the idea was simple: an ex-inspector watches a teacher deliver what they hope is their best lesson. The lesson is filmed with as much authenticity as possible. Although tightly edited there is enough raw classroom video for the viewer to analyze the teacher's performance and make one's own judgments. The inspector grades the lesson, usually as 'good', offers some analysis and then leaves. She returns in a few weeks time to watch another similar lesson, this time looking to see if there is enough improvement to secure the grade of 'outstanding'. In the meantime, the teacher is offered coaching from educational specialists. The series was an instant hit with our audience. It had all the ingredients of a 'good watch' whilst also offering practical advice on how best to secure the coveted 'outstanding' grade. In fact, despite the populist narrative, it was modeling exactly the type of teacher improvement that all CPD aspires to.

It also included analysis both from the expert inspector and from the teacher, in some case it also included the voice of the pupil. In half an hour this format was delivering a rich CPD package and yet it was also fun to watch. As a series it encapsulates the Teachers TV model as well as demonstrating the features that make it so different from the other models of CPD video.

Although that series is unashamedly aimed at securing the outstanding grade, it is important to note that Teachers TV is not devoted to the recording and dissemination of 'best practice'. It is predicated on the premise that teachers are less inclined to learn from 'exemplary' practice

Often because it sets standards they cannot see themselves ever achieving and thereby providing an alienating experience. We focus instead on 'good and interesting' practice. Wherever possible this is practice that has some evidential or research base indicating that it has delivered improved outcomes. However, sometimes it is deliberately more problematic as with another hugely popular

² <http://www.proteachersvideo.com/ProgrammeListBySeries/45/from-good-to-outstanding>

series on behaviour management: *Teaching with Bayley*³. In these programmes we film teachers who are having difficulty and we see their lessons analysed by expert John Bayley and strategies suggested which we then see played out. Across Teachers TV output there is an emphasis on authenticity to promote reflective learning.

The Teachers TV project has now reached scale. It currently has over 3500 videos permanently available on its website. The videos are usually fifteen minutes long with some shorter and some longer, and have been streamed and downloaded thousands of times and watched by tens of thousands of members of the schools workforce via television. Downloaded videos now sit on schools servers and play a part in schools-based CPD, both large group in-service as well as small-group mentoring.

Over 60% of HEI lecturers use these videos in their lectures and seminars and close to 90% of teacher trainees access Teachers TV during their training period. In 2008-09, there were 17 million video views amongst the English schools workforce. On average, 25% of that workforce were accessing Teachers TV every month. It is an innovative service that seems to have taken root with a profession that can be notoriously slow in adopting new ideas.

All of this is very encouraging and suggests that broadcast-standard video that aims to do more than just record and share good and interesting practice, but also to engage and inspire through recognizable characters and a linear narrative, and may offer a disproportionately effective way to raise standards of teaching and learning.

So what does the research tell us about the efficacy of video as a professional development tool? Is there any evidence that video is actually better at delivering quality CPD than the other more traditional and currently more prevalent forms of workshops, lectures and on-line training packages? As we might expect, most of the research is focussed on the second of our three models: the use of raw recorded classroom practice. Perhaps the most pertinent comes from Jim Stigler, a professor of psychology at UCLA, who led an influential long-term study, Trends in International Mathematics and Science Study (TMSS)⁴. This research was based on taking a forensic look at some 600 (in the first instance) maths lessons from around the world. All these lessons were recorded on video and analysed by researchers. The conclusions were fascinating and well worth exploring in their own right, revealing the centrality of teaching quality in improving educational outcomes. However it was when the videos were then used as a basis for professional development that Stigler began to recognize the impact of video as a powerful professional development tool. He describes how when he tried to introduce some American teachers to this video led professional development, he was confronted with that part of the American teaching culture (which as I have mentioned has its parallels here in the UK) which holds that teaching is a private activity and cannot bear too much scrutiny from outsiders. At first the American teachers could not understand why he was showing them 'normal' lessons rather than exemplary ones. The audience felt that the 'poor' teachers responsible for the normal lesson might be open to vilification for their imperfections. However, once his audience had got over their initial concerns, it quickly became clear that they were far more engaged studying

³ <http://www.proteachersvideo.com/ProgrammeListBySeries/37/teaching-with-bayley>

⁴ For a brief overview of the TMSS project and its use in CPD see: The New Heroes of Teaching, Stigler, Gallimore and Hiebert, Education Week Nov 2003

these 'normal' lessons and that seeing actual 'warts and all' practice prompted real dialogue and promoted improvements in practice.

Another American academic, Miriam Sherin⁵ from North Western University in Illinois, has been studying the impact of 'video-clubs' where teachers meet informally to discuss video of their own and others practice. Her conclusion is that this form of discussion was on a different level to traditional models of professional development and made a significant contribution to the development of what she calls 'professional vision'. Classrooms are complex environments with much happening simultaneously and for teachers, 'professional vision' involves the ability to make sense of what is happening in their classrooms. If video is providing the resources for and promoting this 'professional vision' then it ought to be making a disproportionate contribution to CPD practice.

Other research comes to similar conclusions with regard to the propensity for videos to promote professional vision or deep learning. However, there is another conclusion that is common to many other studies. The academics involved seem to suggest that using video only delivers measurable results if it is part of a rigorous and structured dialogue that involves deep analysis. Nanette Seago, who has been working on the use of video in teacher development in Maths teaching for WestEd an education research organization, appears to question the value of unstructured viewing of classroom practice:

Teachers watch video in search of procedures to follow or features to copy. This can create barriers to a deep-level examination of teaching, for it often keeps the focus on surface and superficial features of classroom practice.⁶

Whereas in her view a far more analytic approach is required.

Video can be used with a different frame, an analytic frame which focuses on the *analysis* of teaching practice, gaining the awareness necessary to analyse and interpret the subtleties and complexities involved in the relationship between knowledge of content, student learning and teaching.

Thomas Hatch and Pam Grossman at Columbia University describe a similar approach where video is used to promote deep learning but only through guided analysis of the multi-layered nature of the classroom experience. Despite the appeal to his trainee students of actually watching a teacher at work, they view the process as vulnerable to superficiality since there is so much that cannot be seen or analysed.

These kind of representations (video) 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 analyse the many elements of teaching and learning that are captured in video 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 must be situated, overarching purposes, histories and long-term relationships invisible in daily interactions.

⁵ Sherin and Van Es, Effects of Video Club Participation on Teachers' Professional Vision; Journal of Teacher Education Vol 60 No1 2009

⁶Using Video of Classroom Practice As A Tool To Study And Improve Teaching
Chapter: *Mathematics Education In The Middle Grades: National Convocation in Mathematics Education 1998.*

They are however, setting their students a high hurdle with regard to the purposes and goals they are expecting to realize through this video analysis:

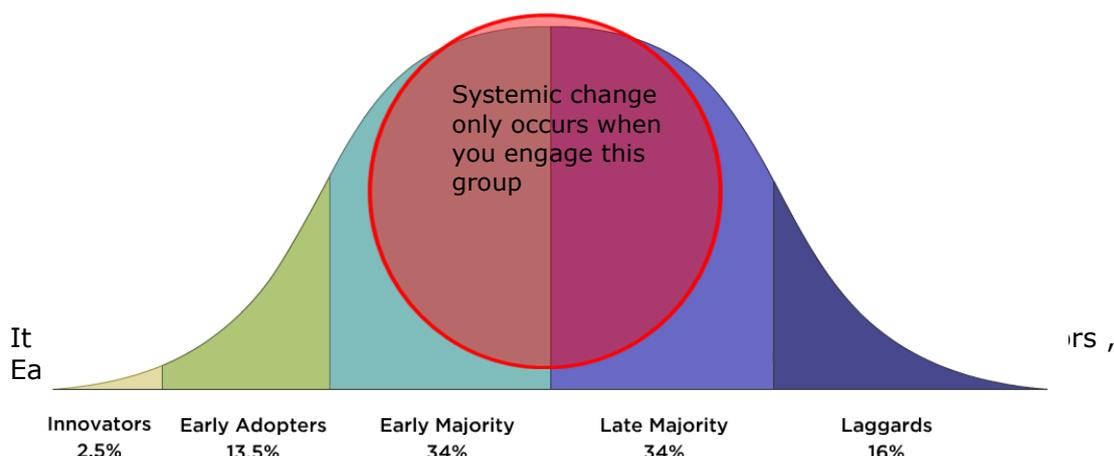
From our perspective, those purposes and goals should include facilitating the decomposition of practice, and fostering an appreciation and deeper understanding of the complexities of teaching at the same time, by both identifying key tools and concepts that novices need to learn to use, and problematizing the reduction of teaching to a “bag of tricks” that anyone with a little subject matter expertise can employ.⁷

What Hatch and Grossman also look at are ways in which classroom video can be contextualized allowing for access to some of the other elements of the whole picture: the teacher’s own sense of his/her objectives and analysis of what occurred as well as the voice of the pupil. On their own admission, if all this content is made available, it makes for a complex offering that requires dogged determination to work through.

Creating a series of representations of the work of a single teacher, a series of representations of a single high-leverage practice across contexts, and a series of representations of different high-leverage practices adds significantly to the complexity of the representations, the time it would take to navigate them, and potentially, the knowledge needed to interpret them.

Whilst there is no doubt that this more rigorous approach to teacher training and development will indeed improve the practice of those with the time and the commitment to engage in this way, it does not help with a more fundamental problem. How do we engage with the significant majority of teachers who are reluctant to pursue any sort of professional development let alone the sort that requires deep analysis?

To identify that group it is worth considering bell curve described in Everett Rogers Diffusion of Innovation. The curve reflects the propensity of people to accept and implement change. He was focusing on technological change but most would agree that the estimates and the categories hold good for the way teachers as a whole approach change in their working practice.



⁷ Thomas Hatch and Pam Grossman
Learning to Look Beyond the Boundaries of Representation: Using Technology to Examine Teaching
Journal of Teacher Education 2009; 60; 70

That is a figure that I believe represents the group that can and do benefit from the rigorous approach to CPD described by the academics above. And this is valuable work with an important group because they are indeed the change makers, the potential leaders and those that will have a greater impact on pupil outcomes than the rest. On the other hand, *system* change will only happen when the remainder of the Early Majority and a significant proportion of the Late Majority fully engage in professional improvement activities. I would propose that CPD, as currently practiced, is failing to make significant inroads into this middle group and that if we are to use CPD as a way to drive change in the quality of teaching, then we need to understand this middle group and tailor our strategies to meet their needs and their perceptions of what improvement means.

So what do we know about this majority group and how can we meet their needs? Most of them have been teaching for more than ten years and few of them perceive themselves to be failing. They have built up their practice over time and generally it has stood the test of time. There tends to be little imperative for change amongst this group. We know that they feel time starved and that they will only allocate time to professional development if it is ring-fenced through formal in-service sessions or if it offers something that will provide a direct benefit to their day-to-day working life. They want lesson, ideas and resources. They ask for quick tips and lesson ideas, exactly the sort of video content that Seaga describes as 'surface and superficial'. They need to be persuaded that what they are being asked to do will make their lives easier. Generally they operate within the parameters laid down by the results they need to deliver and from time-to-time the grade that their lessons will receive in an Ofsted inspection. It is also likely that they will not be confident in the new technology and will find online CPD in particular, more difficult to access and are therefore even less likely to maintain sustained engagement when CPD is delivered on line. Most head teachers recognize this profile and agree that finding a CPD model that appeals to them is one key to sustained school improvement.

So in what way can video help to reach this group? We can be fairly sure that the model of 'high-leverage' engagement described by Hatch and Grossman is not going to work, at least in the first instance. But could the Teachers TV model prove more attractive and thereby help to draw this group into the start of a learning spiral that could then lead them into increasingly deep learning? Certainly, the mass of reach and impact data collected from the users of Teachers TV over its five years suggests that once this group is introduced to this form of video, they do indeed engage and this engagement does lead to better teaching and improved pupil outcomes.

The most startling achievement of the Teachers TV model is that its content is now being accessed by over 25% of the schools workforce (here, defined as including teachers, teaching assistants, school leaders, trainee teachers and governors) on a monthly basis. These are impressive figures and suggest a level of penetration rarely achieved by single purpose agencies or initiatives in the field of professional development. However, it is likely that most of this group come from the left hand end of Rogers bell curve. Nevertheless, regular impact studies make it clear that those that do watch Teachers TV video either on air, or online (the service is shortly to become a wholly online offering in a move to further embed the content into CPD practice of both the school, and the individual), rate it highly and speak of the quality of experience with exceptionally high levels of enthusiasm.

Proactive users of Teachers TV tended to comprise younger teachers, NQTs, and students, in particular they were incredibly positive for a variety of reasons:

- contemporary, up to the minute thinking
- classrooms they recognise as being very similar to the ones they find themselves in
- new and emerging policies and approaches
- expert, best-practice who are at the cutting edge of practice
- down to earth, practical and easily implementable ideas and strategies
- very relevant to the whole of their job remit
- challenging, forcing them to think about what they're planning/doing

This group claimed that TTV was one of the first resources they turned to when planning their lessons.

Counterpoint Impact Study Research Study - August 2007- pp 33-34

This was backed up more recently when the Bill and Melinda Gates Foundation conducted research into the attitudes and perceptions of regular Teachers TV users and found that 75% of respondents agreed that "Teachers TV provides the tools to make me a better teacher".

But perhaps the most startling result of that research came about when they interrogated users on whether or not implementing what they had seen on Teachers TV had resulted in an improvement in pupil outcomes. Here 51% stated that it had. Although this is self reference data and not an objective study, this is a remarkable figure as it is hard to replicate when applied to any other CPD resource or initiative.

So why is it that Teachers TV appears to have established a potent third sort of CPD video? As described above, it allows teachers into other teachers' classrooms in an unthreatening way to share good practice from peer-to-peer. This promotes reflective learning based on authentic classroom activity and provides all this through engaging video formats and narratives. I want to argue that Teachers TV model appears to have even more potential to reach and improve teaching and learning for the Early and Late Majority on that Rogers curve. That is because, the reasons teachers are slow to change is because they have developed their skills within firmly established habits. These reflect a teaching culture as it was for them when they were young and indeed the habits inculcated by much teacher training. (For an overview of this analysis see *Stigler 1998*)⁸. Changing teachers' habits requires more than merely disseminating professional knowledge, and it becoming clear that the best way to affect change is by allowing teachers to see alternative practice rather than being told about it. That's what video can do, and I would argue that it is the process that the Teachers TV model of CPD video does best of all.

Whilst it is clear that highly structured and mediated structured professional development sessions built around short raw video clips can and do deliver improvements amongst the 'innovators' and 'early adopters', there are other, possibly even more long-lasting benefits to be gained from this alternative model. In talking about Teachers TV, many respondents talk about how these programmes 'remind me of why I became a teacher', 'inspire me to try new things' and 'encourage me to be a better teacher'. This sort of motivational benefit could be just as valuable as any concrete measurement of improvement. For example, could video play a part in improved teacher retention? Could inspiring video of real school leaders grappling with and solving real problems help more teachers to see themselves as leaders? And finally could more 'user-

⁸ Teaching is a Cultural Activity, Stigler and Hiebert, American Educator, Winter 1998

friendly' video that draws on the best of popular television, lure that large group of teachers who still do not value CPD, into a more sustained engagement with their own professional development?

Andrew Bethell
Chief Executive, Teachers TV

References:

Nanette Seago

Using Video of Classroom Practice As A Tool To Study And Improve Teaching
Chapter in *Mathematics Education In The Middle Grades: National Convocation in Mathematics Education 1998*.

Thomas Hatch and Pam Grossman

Learning to Look Beyond the Boundaries of Representation: Using Technology to Examine Teaching

Journal of Teacher Education 2009; 60; 70

Jim Stigler

For a brief overview of the TMSS project and its use in CPD see: The New Heroes of Teaching, Stigler, Gallimore and Hiebert, Education Week Nov 2003

Teaching is a Cultural Activity, Stigler and Hiebert, American Educator, Winter 1998

Miriam Sherin

Sherin and Van Es, Effects of Video Club Participation on Teachers' Professional Vision; Journal of Teacher Education Vol 60 No1 2009

Links to Teachers TV videos referred to in the text:

From Good to Outstanding

<http://www.proteachersvideo.com/ProgrammeListBySeries/45/from-good-to-outstanding>

Teaching with Bayley

<http://www.proteachersvideo.com/ProgrammeListBySeries/37/teaching-with-bayley>

Andrew Bethell began his teaching career at a Hackney comprehensive school in 1970 where he taught for seven years holding a variety of senior posts. In 1987, he left teaching to found an independent production company, Double Exposure, and became one of the country's leading documentary producers". In 2003 he joined the team that launched Teachers TV as Director of Programmes. In 2006 he became Chief Executive and Creative Director and is recognized as the creative and editorial driving force behind the success of the innovative professional development resources now being adopted around the world.

