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This article considers how knowledge, education and research interact as the institutional structures that support them change. Many efforts at large-scale education reform depend upon the proposition that what counts as useful knowledge can be easily defined, without reference to the specific contexts in which that knowledge will be set to work. Yet “useful knowledge” as it appears to policymakers does not always translate into “useful knowledge” from the perspective of practitioners. Distance and context matter. Based on studies of the development of literacy policy in England under successive governments, this paper assesses the dislocations and divisions of labour that characterise the contemporary knowledge landscape and asks how the research community can continue to act for the common good in an increasingly crowded and contested education field.

Key words:

Introduction

In my presidential address at the BERA conference in 2015, I re-examined how we think about knowledge and research and their relationship to each other in education policy and practice. I argued that there was an urgent need to disentangle and rearticulate the difference between knowledge and research as ways of knowing. In making this case, I drew on Bernstein’s work on the sociology of knowledge, treating that work as always interested in the specifics of time and space (Bernstein, 1996). The core conceptual tools that Bernstein set out for understanding the social dimensions to knowledge bring into focus the changing social relations in the wider society that help define the forms knowledge takes and their function. This article takes up the question of where education researchers should now focus their gaze as the knowledge landscape changes around us.

Politicians’ and policymakers’ efforts at large-scale education reform depend upon the proposition that what counts as useful knowledge can be easily identified and defined without reference to the specific contexts in which that knowledge will be set to work. Yet close study of large-scale reform
programmes as they evolve over time makes clear that “useful knowledge” as it appears to policymakers does not always translate into “useful knowledge” from the perspective of practitioners (Coburn et al, 2009; Earl et al, 2003). Distance and context matter. Indeed, the metaphors of best practice, benchmarking and policy borrowing wear increasingly thin when they are used to short-cut the ways in which professional practice evolves in situ in favour of collating and distributing a set of knowledge that is treated as closed. Research provides a very different set of principles upon which to act, once we reclaim as a key virtue its capacity to act as an open-ended process in which the horizon to knowledge continually shifts in response to the challenges and tests it is subject to.

When policymakers prioritise the distribution of ready-made knowledge as the main driver of educational reform, everything rests on who is in a position to determine which forms of knowledge will get circulated, where (Moss, 2009). Yet the criteria policymakers use to make that choice are seldom fully transparent. Knowledge-brokers and mediators make many of those choices for them, with lobbying, anecdote and the immediate priorities associated with political expediency, all important in shaping what gets taken up (Nutley et al, 2007; Sanderson, 2009). The practice of research orientates to the business of knowing in another way, keeping in tension what we think we know and what else might emerge to challenge or disrupt that state of affairs. Research at its best is transparent about the processes involved in its creation, and reflects honestly on both the strengths and the limitations of the tools it deploys. It develops over the longer term, by robustly keeping under review the propositions it encodes. The capacity of research to adjust in the light of new data or different social conditions makes it a powerful means of learning from the past and reframing current questions in the search for better answers.
By drawing on examples that demonstrate these dynamics at work, this article will argue for the value of the practice of research as a mode of engaging in the social world and set out an agenda for doing so well in an increasingly complex and contested educational field.

**A shifting knowledge landscape**

In considering the education field, my argument is not that there is a crisis in the relationships between knowledge, education and research, but that the ways in which they interact have changed. We can think about this structurally, in terms of the institutional make up of the field of education; formally, in terms of how knowledge is defined by those who make, acquire or use it in different contexts; and in practice as the role of research within the field of education alters, and the financial basis that enables research to happen changes too. All of this is leading to a very different knowledge landscape which in some senses is evolving simply because it can.

In one sense we all know this. Consider the many different ways in which knowledge now circulates outside formal education structures, the institutions and courses that once put it in order for students who enrol. The internet makes it possible to find and retrieve an increasing depth and range of source material on a wide range of topics using search engines such as Google Books and Google Scholar. Yes, academic journals may not yet have fully embraced the principle of open access, but Google Scholar can take its users to authors’ own versions of pdfs that can be downloaded straight away. Institutional depositories encourage this practice, for it helps citations and measures of impact. Authors’ email addresses can be located easily and direct requests for copies of their papers may well lead to a response. Authoritative articles on key issues in the social sciences can be consulted in Wikipedia and will be regularly updated by the community of scholars. It is now possible to search for and find a relatively large amount of material on a given topic very fast.
An array of new knowledge brokers now facilitate this activity of find and retrieve, acting as guides to what is worth following up. Professional knowledge may as easily be shaped by individuals writing in the blogosphere (See, for instance, Research Ed, http://www.workingoutwhatworks.com/) or by organisations that specialise in creating knowledge digests with a particular audience in mind (such as the NFER, https://www.nfer.ac.uk/), as through formal study. The education field has become a much more crowded space, filled with knowledge of different kinds that can be easily accessed in no particular order, without the strong delineation and sequencing that a formal curriculum provides. The time to identify, assimilate and translate any such knowledge into usable practice shrinks, even as the knowledge content changes its form into bite sized chunks to match. Turnover in knowledge content speeds up. As Bernstein commented:

“There is a new concept both of knowledge and of its relation to those who create it, a truly secular concept. Knowledge should flow like money to wherever it can create advantage and profit. Indeed knowledge is not like money it is money. Knowledge is divorced from persons their commitment, their personal dedications, for those become impediments, restrictions on flow and introduce deformations in the working of the market.”

Bernstein, 1996, p147

The crowding of the space creates tension points for institutions that have played a key safeguarding role in formalising how society conceives of education and which have historically assumed a right to define who is entitled to know what. Yet the diverse ways in which the knowledge landscape is changing, around and beyond formal education also acts as a timely reminder that the social organisation of the education field is in some senses always arbitrary, always culturally shaped. The institutions of modern day schooling and the contemporary university, the sequences in the curricula they set out and the qualifications they create, are products of a particular moment in time, not general and immutable laws for how things must be. Look back in time, and the school
and the university have always taken their place within a larger and more mobile knowledge landscape that operates independently of them.

The many and varied texts that can be readily accessed via the web bypass older certainties about what it means to know and the codified and regulated practices and products that the formal education system generates and endorses. Formal ways of assessing what counts as certain knowledge, and how it is best acquired are challenged by what individual readers in different social settings make of the diversity of sources they have to hand and which they use to become knowledgeable on their own terms (Wenger, 1998). Old hierarchies in knowledge making and knowledge exchange are weakening. The increasingly direct involvement of government and policymakers in shaping what education should be and which kinds of knowledge should circulate where at what speed, tells us that. The question for educational institutions is how do they react?

Look back in time, and echoes of much less formal ways of thinking about knowledge and how it is acquired can be found in the concepts of “polite science” and “polite education” (Alberti, 2003; Gascoigne, 1994; Secord, 2006). These terms are used by historians of science studying the long eighteenth century (that period when the late 1700s gave way to the early 1800s) to describe how crucial elements of scientific knowledge developed in and through the conversational culture of the time. They encapsulate very different working assumptions about what knowledge was, how it could be obtained and indeed what it meant to know, that then held sway amongst the cultured elite (Secord, 2006). They are of interest for historians of science, precisely because these ways of developing substantial expertise look far less well regulated than the kind of education through formal schooling we expect today. “Polite education” depended upon reading widely and reading well through the resources one could expect to find in a well-stocked (gentleman’s) library. Such a course of reading would be undertaken individually and on the basis of personal advice, some of which survives in individually authored publications (Chapone, 1790). This was the context in which
Mary Somerville, whose name is now attached to Somerville College Oxford, came to translate some of the most cutting edge scientific works of the early 19th century into the English language, spreading powerful scientific ideas so that they might fuel “informal conversation in the clubs, salons, and soirées of the English social elite.” (Secord, 2006). This is education detached from the credentialism of exams and left largely in the hands of the individual learner. The mark of whether it was done well or not depended upon how well-judged any contributions were considered to be in polite conversation with others.

Reach back to the distant past, and it is possible to see that how education is organised links to the social conventions of the day, and that these conventions derive from other aspects of social life including the distribution of wealth and leisure within a given society. There is not an inner logic to the “science of education” that means we have to organise education “like this” to achieve particular ends. Rather the ends look rational given this set of conditions. The new ways in which knowledge now flows from place to place are creating different conditions in which educational institutions and structures must find their place. The ways in which we have imagined these institutions in the past are beginning to show their age. The difficulty seems to be in fully re-imagining what else they might become.

**Accounting for the role of education(al) research in a changing knowledge landscape**

What about research and research in education? How is it faring as the knowledge landscape changes? BERA presidential addresses have for some time acted as a way of taking stock of the field and it is customary in such an address to review what has gone before. Looking back, much of the emphasis in discussion has fallen on what distinguishes educational research from research in other disciplines; and what any such differences then mean for the relationship of educational research to policy. I wonder, however, whether the point of comparison to disciplinary knowledge elsewhere is
as helpful as we might suppose. In previous addresses, this has provided a relatively tight frame from which to consider

- How the field of education can best be defined and understood, when it contains so many different groups who often seem to jostle and compete rather than collaborate and work together to settle a course of action and set an agenda for change? (Rudduck, 1995)
- To what extent should education borrow from other disciplines, or act as an integral field of enquiry in its own right? (Furlong, 2004)
- What are the defining characteristics of research undertaken in and for education (Whitty, 2006)?
- Who can or should define the point and purpose of research undertaken in and for education – what is the end goal? (Mortimer, 2000)
- How could or should research within education mediate or respond to the interests of other stakeholders? (James, 2012)

Repeated discussion of these same themes suggests that education as a knowledge field has always had relatively weak boundaries. Education has found it hard to hang onto a well-protected space in which to act autonomously. When such opportunities do arise – as they have from time to time – they generally do not last long. This leads to much soul searching about why this might be the case and where the fault lies, within the community itself or beyond. In comparison to other more well boundaried knowledge domains education has often behaved as if it were the odd one out. I think on the contrary that the problems education as a discipline has faced are becoming more general. It all depends on how you set the frame.

One way of reflecting on the strong boundaries to knowledge making in the past is to think of an Oxbridge college. These physically manifest as knowledge factories, sealed off from the outside world, and operating behind closed gates. Their interior spaces open up only to those entitled to
pass the threshold. Yet Education as a discipline has never found it easy to draw its own boundaries so firmly, in part because of the broad range of stakeholders that it is always answerable to, and the shifting social conditions that reshape its purposes as the nature of work and leisure change around it too. Now the impact agenda, and the revival of the concepts of socially useful, or economically advantageous knowledge, are weakening the boundaries of other knowledge domains as well, making them also answerable to others elsewhere (Maton, 2005; Young and Muller, 2010).

In thinking about what has changed in the social organisation of knowledge I am drawing on the work of Basil Bernstein, his concepts of classification and framing and the work they do in creating boundaries in social practice at particular moments in time (Bernstein, 1996). The salient categories that are created through classification and framing map out and then help reproduce the social order. Crucially, for Bernstein, it is the strength of the boundaries between categories that matters, not the defining attributes of each category considered on its own. Using a Bernsteinian analysis I would suggest that in looking for answers to education’s problems within the disciplinary category “education” we are looking in the wrong place. Education has become problematic because of its relationship to other social categories that lie beyond it and outside of education’s reach. I am arguing that we urgently need to re-map where the most salient boundaries to knowledge-making now lie, taking into account the more rapid flows of knowledge taking place outside of educational institutions and involving different players (Moss, 2013). The socially salient categories have shifted as new relationships form.

Applying Bernstein’s terms to the current knowledge landscape, my argument in brief is that knowledge is becoming weakly classified whilst the framing of education discourse remains strong. This paradoxical situation is made more so because framing increasingly rests not with those who produce knowledge within education but with what Bernstein describes as the Official Recontextualising Field (ORF), a field created and dominated by the state and its selected agents
(Bernstein, 1996). To that analysis we might also add the increasing reliance of the ORF on what Susan Robertson (2012) has described as the Commercial Recontextualising Field (CRF), another set of players whom policymakers rely on to get their work done.

**Dislocations and divisions of labour in the knowledge field: putting policy in the picture**

The point I wish to draw attention to here is not that policymakers increasingly exercise control over how education is realised. We already know that: by taking powers to standardise curricula and borrow from other systems, they are in a position to arbitrate the forms of knowledge that flow within a given system. But such a division of labour leads to new dislocations within the education field that are still not adequately described. And here the role of research becomes much more crucial to my analysis than the role of knowledge.

To explore some of these dislocations I will take as my example a photograph, taken in a primary classroom and published during the last general election campaign, showing the then Prime Minister, David Cameron, reading with 6 year old Lucy Howarth (http://www.theguardian.com/artanddesign/gallery/2015/dec/26/the-20-photographs-of-the-year). It records a school visit planned as a photo opportunity – that’s why the photographer was there – which was timed to coincide with the Prime Minister’s announcement that under a Tory government, children would be expected to re-sit exams at secondary school if they had not reached the necessary standard in core subjects at primary school.

The shot, which was widely republished, shows Lucy with her head resting on the table, as Cameron casts a rather baffled glance in her direction. This is clearly not what he was expecting her to do. The longer sequence of photographs of which this was part were striking enough to lead to a story in the local press under the headline:
That awkward moment when the Prime Minister says you have to resit your English and Maths exams...

The story continued:

Prime Minister David Cameron’s reading session got a bit much for six-year-old Lucy Howarth.

Prime Minister David Cameron may have been chuffed with his latest plans to make sure pupils pass their Sats examinations but one little girl from Bolton was less impressed. Lucy Howarth, six, was tasked with reading to Mr Cameron during a visit to the Sacred Heart Roman Catholic Primary School in Westhoughton. Yet the story time session proved a bit much for little Lucy – who took a moment to rest her head on the desk.

Even the PM appeared confused about the plot of the book, declaring it “complicated stuff”.

The accompanying sequence of images show Lucy going from a confident start in reading aloud to the Prime Minister, to utter horror as she realises she can’t recognise the next word in the book, to putting her head on the desk as the only way out of the situation (Lucy’s own account of the incident can be found here: http://www.theguardian.com/news/2015/dec/26/stories-behind-pictures-2015-april-to-june).

This was clearly not what was intended. Yet in many ways this nicely represents some of the substantial dislocations now characterising the education field. In particular the dislocations and divisions of labour involved that take decision-making about education from the places where teachers and children work to the spaces that politicians and policymakers occupy. If education
policy from a politician’s point of view means choosing between options – for large scale system reform; for these modes of assessment; for these curricula; for these means of training teachers – then they make those choices some way away from where the consequences of those choices actually unfold, and indeed without much possibility of understanding what those choices will mean in practice for those they most closely affect. They are not intimately connected to the places where education happens, precisely because education is not their job. The pictures of Lucy work as a story because they show the gulf between the political interests on display, and the interests of the child attempting to read. The politics can’t bridge this: the best Cameron can manage is the phrase repeated in the newspaper report; “this is complicated stuff”, by which he seeks to smooth over the disjuncture between the politician’s need for a successful backdrop to his announcement and the interpersonal dynamics to reading on a public stage that Lucy finds herself confronted by. A teacher would orientate to the latter; he cannot.

There are other dislocations represented in the media story. David Cameron’s proposal that children should resit exams they have failed is now being put into practice. The logic to such a policy is worth pausing over. To take one example, pupils aged 6 and above who have failed to pass the phonics test at two successive attempts, will be made to re-sit it for a third time. The policy logic assumes that: the phonics curriculum as it stands in English schools is key to every child learning to read successfully; that success at word level decoding can be reliably captured by the measures used in the phonics check; and will have a decisive impact on the end of KS 2 reading tests. All of this despite the fact that the tests at key stage 2 set out to capture different aspects of the reading process from the decoding skills represented in the phonics curriculum, and that the validity and reliability of the phonics check itself are still unproven. In fact, neither set of test results support the proposition that reading success automatically follows from teaching synthetic phonics first and fast. Gains since this policy was introduced have been modest, and have not matched the initial increases in reading attainment seen under the previous administration’s National Literacy Strategy, a policy
which gave equal weight to other teaching strategies besides phonics in the earliest years of reading (Stannard and Huxford, 2007). The data should give politicians pause for thought (Insert Figure 1 reading attainment graph here).

The logic that makes escalating the number of examination resits a plausible strategy nonetheless runs something like this. If not all children pass the test it is the teacher’s delivery of the phonics curriculum that is at fault. If all teachers simply delivered the curriculum to plan and with fidelity, then everything would be resolved. We know from consultations on the phonics checks that the government has carried out that this is pretty much the view of advocates of the efficacy of the phonics programmes now embedded in the curriculum. And yes, some of them do have commercial interests in the products that are sold into schools to deliver this. But the logic at play also fits well in the context in which politicians operate. It assumes that the initial choice of teaching phonics first and fast was correct, and then protects that choice from being seen to be wrong. This has clear advantages when the politicians in the firing line if the policy doesn’t deliver are the ones who argued for the introduction of the phonics curriculum and the phonics test in the first place.

By contrast, teachers might well make a rather different assessment of the difficulties individual children in their own classroom are experiencing in learning to read. They might well wish to explain and address those difficulties in other ways, not least by trying out a broader range of methods that might better support those children struggling with a phonics first and fast approach (See Ellis and Moss, 2013.) The political insistence on repeated test resits stops such enquiries in their tracks. This is what social control looks like in the symbolic field. The insistence on certainty in the political domain and the need to prove a policy choice right are here getting in the way of any clearer enquiry into the nature of the difficulties some children experience in learning to read. They also inhibit the search for more productive answers.
This takes me on to thinking about the role of research as a way of knowing. In the short speech Cameron made on his school visit, the facts of the matter he quotes are treated as self-evident, and lead to a simple conclusion:

“The facts are these. Today you have around a hundred thousand children leaving primary school that don’t have the right skills and so we are saying they must resit those key tests in reading and writing in numeracy when they get to secondary school so they get those skills.”

The facts may indeed be as reported, but the conclusions drawn: that resitting tests will get these children the skills they lack, relies on a far more tenuous logic. Facts rarely tell you what to do with them. The evidence upon which a particular case rests always requires interpretation. And the possible interpretations of the facts or the available evidence may well be multiple and are often in conflict, one with another. In the case highlighted above, interpretations that support resits leave unchallenged the initial beliefs and prior commitments to supposing x is so that led to the introduction of a phonics-based curriculum in the first place. Certainty that this is the best remedy outlasts the evidence to the contrary. Take a research lens to the role of phonics in teaching children to read, and it becomes necessary to explain why not all children have benefitted as predicted. This leads to a very different set of questions, of a kind that research is best placed to answer precisely because of its preference for focusing on what remains uncertain or doesn’t yet fit. The discrepancies in the case generate new knowledge and understanding as researchers look for ways of resolving them.

Indeed a much more nuanced and rigorous research literature already exists that has explored the more interesting question: for which children does phonics teaching work most effectively, and in
which form? More crucially, are there children for whom phonics teaching might do some harm (Connor et al, 2004)? This is a key question that current policy ignores. Because not all education systems in English speaking countries adopt a phonics first and fast approach, yet still have considerable success in teaching children to read (New Zealand is a notable example), it is possible to explore at depth whether the decision to teach children to read via phonics or via real books has lasting and significant impacts on their later reading skills, and if so what they are. Longitudinal studies of this kind suggest that only some children benefit from a phonics first and fast approach, and that the transaction costs for others (the time spent on structured phonics teaching) detracts from and slows down acquisition of a range of other important skills that competent readers need to become fluent readers (Thompson et al, 2004; Connelly et al, 2009).

It takes time and research skill to tease out these relationships. Yet without this work the necessary and sufficient conditions that enable a particular pedagogical approach to work here, but maybe also not there, cannot be understood. Blanket prescription from the centre, of the kind associated with policy-driven reform, may have a role in setting minimum thresholds for an education system to function. Attempt much more than that and what holds true on average may precisely obscure what holds true in this particular case, for this particular child. Teachers and researchers know they need to keep both the general and the particular in mind. By virtue of the distance at which they stand from the classrooms where these issues arise, politicians’ readings of the situation differ. The plausible logics that support their decision-making are shaped by the very different social contexts in which they act.

**Whose purposes does assessment serve? Tension points in policy and practice**

The fact that examinations themselves have become a key focus in party political policymaking in England is interesting. This represents a deepening dislocation in the field that has real and
significant consequences for processes of teaching and learning in the classroom. Assessment as a social practice embedded in the classroom links directly back to an individual child. This is very different from assessment as system data to be viewed from afar.

In educational institutions, assessment has many different functions. When embedded in everyday classroom practice it can mean no more than the teacher’s real-time adjustment of pedagogy in response to how they see pupils taking up the tasks they are working on. It is a feedback loop that is integral to pretty much any form of social interaction, and also has a particularly crucial role to play in pedagogy: opportunities to learn and the nature of the teaching that takes place happen through these processes of adjustment, shaped by the dialogue between teacher and pupil. Assessment at the level of the group can also be used more strategically to inform teacher planning, guiding decisions to spend more time on this aspect of the curriculum rather than that, given the teacher’s judgement of the levels of understanding of key concepts in a whole class. More formally still, it can also be used to measure one child’s performance against another, in the light of marking criteria that derive from the curriculum objectives that have been laid down for a particular level of work. This may or may not determine how children are placed in teaching groups. At some point, and these vary widely within different national education systems, such assessments also attach themselves publicly to a child or student as they leave education and migrate into other educational institutions or the world of work. At this point context-specific assessments turn into something else again, bargaining chips for employment and a future to be spent outside of education.

But recontextualised into policy the function of “assessment” becomes synonymous with system management: the connection to the individual child weakens, the connection to political risk strengthens. Placed in the public domain, assessment data become powerful instruments that can be used to hold politicians publicly to account for the decisions they have made. In effect the notion that statistical data are part of the instruments of power that the state uses to construct the citizen
has flipped over: these days when they appear in the public domain the data have become the means by which the citizen and the media hold the government (and its agents) to account. By and large the story the data appear to tell is that the state has not done well enough. (See for example reporting of PISA data: http://www.bbc.co.uk/news/education-25187997).

From a politician’s point of view, the logic of the data that education collects proves particularly troublesome. For the machinery of assessment that education deploys is designed to discriminate between one pupil’s performance and another. It must create variation, not the same outputs. This inevitably leads to a distribution curve with a midway point in the dataset, that can be variously calculated as an average. But recontextualised into public discourse average performance is interpreted not as a descriptor of where most data will fall, but as meaning not good enough. Differences in performance are read as proof that the many could achieve at the same level as the few. Statistical outliers, the term used in statistics to indicate those few cases that inevitably fall beyond the mass of data, become goals at the top of the distribution curve that could and should be met by all.

The numerical precision lying behind the statistical calculations does not translate into public discourse. On the contrary, it is recontextualised into commonplace thinking as this exchange between the then Secretary of Education and the Chair of the Education Select Committee on school performance illustrates:

**Q98** Chair: if "good" requires pupil performance to exceed the national average, and if all schools must be good, how is this mathematically possible?

**Michael Gove:** By getting better all the time.

(http://www.publications.parliament.uk/pa/cm201012/cmselect/cmeduc/uc1786-i/uc178601.htm)
Commonplace thinking creates harsh judgements, not least for individual schools. Ofsted, the school inspectorate that answers to politicians, treats any variation in performance in the cohorts of pupils passing through a school as significant, and as an accurate assessment of variation in the quality of teaching. In reality they are the product of normal fluctuations in a sample, which at school level, cannot be large enough to be statistically representative of the population at large, and where variation would therefore be expected. The wrong conclusions are drawn from year on year changes in performance data that are not statistically significant. Meanwhile, on the other side, too uniformly high performance is regarded as untrustworthy, or as failing to deliver on education’s primary task to clearly identify the “brightest and the best”.

There has been a significant increase in the proportion of people receiving firsts and 2:1 degrees. To the extent this expansion in the number of firsts and 2:1s is to do with rising levels of attainment and hard work, I applaud it. But I suspect I am not alone in worrying that less benign forces are at work with the potential to damage the UK higher education brand. (Speech delivered by Universities Minister, Jo Johnson, 1 July 2015
https://www.gov.uk/government/speeches/teaching-at-the-heart-of-the-system)

Heads they win, tails you lose.

In all these ways, the distances and dislocations in the education field that run with the strong framing of education by the official recontextualising field have the potential to be deeply disruptive of pedagogy itself. They make it harder for those closest to the classroom to focus on the job in hand, and clarify through close observation what works and what doesn’t work, for whom, under these conditions. We have forgotten the virtues of a “separation of powers” that recognises the dissimilarity in what politicians know and understand about education from what the teaching
profession and the research community know and understand about it too. If there are to be fruitful dialogues across these divides, each party needs to recognize much more precisely how the very different social spaces they occupy shape what they see.

**Policy in practice**

In reflecting on the dislocations that flow from the current divisions of labour entrenched in an increasingly crowded education field I am arguing that the problem here is not with the availability of certain knowledge, bullet-proofed against use, that could be reliably shipped from site to site, and from one part of the education field to another. The policy community has in effect substantially road-tested this proposition through the rounds of large-scale system reform that have already taken place, and it simply doesn’t stand up to the facts of the case. This is not to say that systems can’t improve, but improving systems by shipping standardised product from here to here only gets us so far. Indeed it may only be a sensible thing to do under certain conditions. Michael Barber, in many ways a key figure in education policy under New Labour, has certainly reached this conclusion (Barber, 2007.) I also think the Tory party learnt this too from watching the politics of the National Literacy Strategy unfold. But learning this from the position of a policymaker is very different from learning this in the context of a school. And here the inequalities in the power to decide “where to next” really matter.

Politicians are inevitably concerned with the political risks involved in taking one decision rather than another. This runs alongside their ideological preferences – for the social good education can do, in the different terms in which they express this; and for the ideal size and role of the state in making education provision. The space in which they operate colours their decision-making; and their decision-making responds to the pressures that develop over the policy cycle. Without due separation of powers, schools find themselves dragged into a timetable that is not of their own making, responding to changes they have neither sought nor instigated.
The political logic that took England from substantial investment in a centrally-directed system of support to schools to a system of do-it-yourself support in which government expects schools to carry the risks of deciding on this strategy rather than that, with minimal guidance, can be tracked if you know where to look. The fortunes of the National Literacy Strategy analysed from within the lifecycle of New Labour’s period in office demonstrate how a broadly successful policy became subject to political ambush (Moss, 2009). The abrupt dismissal of the professional knowledge base that supported the NLS once a new government took office and consigned all the materials associated with it to the national web archives, brings into sharp relief the discontinuities between the timelines associated with political decision-making and the timelines associated with professional practice. They also speak to real inequalities in the rights to decide. I am pretty certain that only a minority of schools in England would have chosen to go to all-out autonomy coupled with high-stakes accountability as their preferred alternative to the systems of professional support the National Strategies provided.

Trapped by the performance data into the logic of decisions made elsewhere, it is hard to know how to react. It really does look like the only way out of this mess right now is to re-build from the bottom up, by reasserting what the dilemmas look like on the ground. And in many cases this means reframing the questions that need posing, starting from the interactions in the classroom between pupils and teachers that make up the curriculum here in this school, rather than looking for answers to questions posed elsewhere through the lens of the data the system now churns out.

In many respects, in less than ideal conditions, this is what at least some schools in England are beginning to do right now. Paradoxically, the logic that drives the party in power to try and give the problem of school performance away, also creates a space in which other things can happen. Provided the high-stakes accountability measures weaken too. The picture here is mixed. There is a
political logic to burying the numbers – I would argue this is reflected in the decision already taken by the Department of Education to remove Levels, the successive performance indicators pupils in English schools were expected to hit year on year to demonstrate that they (and their teachers) were making continuous improvements. And the abandonment of baseline indicators. The idea that tests on entry to school could be used to reliably predict progress always looked like deeply flawed. Not least because it presumed that successful learning is always a matter of making incremental and measurable gains; and that the curriculum itself is organised to match in a linear and stepped fashion so that one additional fragment of knowledge gained here adds to the pile already accumulated, making a bigger whole. A good deal of curriculum knowledge simply can’t be sequenced like this: think of the difference between arithmetic and algebraic thinking. These are indeed different ways of knowing that do not flow directly, one from another. Much more of the curriculum is like this than curriculum lists would have us suppose. Obtain this competence and it is not inevitable that this other one will follow.

The predictive power of assessment and the assumptions about monitoring progress on which it is based are open to challenge. The idea that all children follow the linear trajectories that Ofsted describes by averaging children’s progress over time do not stand up to scrutiny. In particular, Becky Allen’s work at Education DataLab reanalysing the National Pupil database is beginning to reveal how little our assumptions about pupil progress really hold (Allen, 2015 p 10-13). She points to some real harm that may flow from dividing pupils into different progression pathways based on early assessment and predicted linear and incremental progression thereafter. In fact in any one year most children do not hold to the line created by averaging children’s performance from different starting points, using the methodology test creators have adopted, but as one might expect, either over or under perform against such expectations. Indeed the accuracy of any predictions is particularly poor for those children with low levels of attainment early on. The report comments:
Our evidence suggests that the assumptions of many pupil tracking systems and Ofsted inspectors are probably incorrect. The vast majority of pupils do not make linear progress between each Key Stage, let alone across all Key Stages. This means that identifying pupils as “on track” or “off target” based on assumptions of linear progress over multiple years is likely to be wrong. This is important because the way we track pupils and set targets for them influences teaching and learning practice in the classroom, contributes to headteacher judgements of teacher performance and is used to judge whether schools are performing well or not. Providing pupils with the curriculum diet that is deemed suitable for the ‘Level’ they are working at may be doing them a profound disservice. (Ibid, p12)

The capacity of research to scrutinise and unpick the assumptions we build into the interpretation of the data, and to rigorously question the commonsense logic that currently holds, all matter enormously here.

**Reclaiming the virtues of research**

All of this takes me back to setting out what I see as the core virtues of research. That it

- keeps under review the extent to which a particular proposition holds;
- is methodologically transparent about how the research was conducted, and what weight can therefore be given to the findings
- pays careful attention to the effects of doing x rather than y, making clear what was left out of the picture as well as what it brought into the picture
- is aware of the consequences of framing a research question like this – so that a, b and c will for the purposes of this research be ignored in favour of d, e and f –
- and therefore understands what is missing from the model deployed as well as what it can see.

In essence, this is what we teach through study for a PhD, a process which precisely asks students to reflect on the strengths and the weaknesses of making knowledge in this way with these methods in relation to these research questions. The PhD is thus not so much a vehicle for teaching students a
reliable repertoire of methods that are expected to produce guaranteed results. It is an exercise in understanding what kinds of knowledge these methods produce when deployed in this way. Students are expected to assess the inevitable trade-offs that have been made in the course of choosing this path rather than that; and only in that light review what the actual contribution of their findings might be to a larger field, and a longer research tradition that has travelled that way before. In the viva students are expected to make an honest assessment of the limits of the claims that can be made from their study given the choices that they exercised in their research design. It is in these terms that the thesis has to be defended. The PhD is thus not primarily about demonstrating the merits of the findings considered in their own right, but weighing the process by which those findings were made.

Research fosters a particular way of knowing which I would argue has real value in a complex and fast-changing world. For good research, well-conducted, curbs the dangers of hubristic thinking by submitting any claims made to rigorous scrutiny. This is done in different ways within different research traditions: through vigorous debate with peers: through repeating designs and checking whether the outcomes are the same; by checking what happens as a body of research is applied in different contexts or under different conditions; by always entertaining the notion that new data may require a model to adjust, or maybe even a whole way of thinking to be revised; by checking on the depth of the database and the robustness of the methods that have produced or substantiate these findings in other contexts.

The capacity to test, revise, and reframe the nature of the issues under discussion are key characteristics of any research tradition not the monopoly of some. Arguing over who has the best method, or superior ontological and epistemological position for getting to the truth, is a profound distraction. It is a question that cannot be answered in the abstract. For which method is most apt must always depend on the particular case and what it is we want to find out, under these
conditions. Done well any form of research can show us something, none will show us everything. The tools deployed provide a partial view: what is excluded precisely allows for a more detailed focus on the central issue under investigation using these methods. The specifics matter. The difficulty in debate rests with the claims made afterwards, if and when the findings are treated as absolute truths to be traded one against another, and we forget that each such claim is always grounded in how it was made.

**An agenda for research going forward**

In much of this address I have been emphasising the need to plug the research we conduct and the approaches we use back into the specifics of time and place, and the social contexts which make such research purposeful now. Yes research builds on what has gone before, and the internal trajectory to that knowledge base, but it cannot cut itself off from the contexts in which that knowledge will be used, the places it will travel to and the unexpected ways in which it may be appropriated for very different purposes elsewhere. As researchers we have to be cognisant of these facts, and shoulder the responsibilities they bring with them. This is part and parcel of good ethical practice in research.

The research traditions I draw on as an ethnographer, as a social scientist, a sociologist and as a feminist, all favour thinking about knowledge in its contexts of use in this way. Not all research traditions do so as explicitly. But some of the most powerful and enduring ideas in education are precisely based on the recognition that knowledge changes in the interactions between teachers and learners. That such processes in large part depend upon the range of resources that those involved can muster to shape thinking now. And that the new always has the potential to refashion the old as they are brought into dialogue.
In an applied field such as education, researchers are well placed to bring such dialogic ways of thinking to bear on current dilemmas. This requires recognising differences in the social contexts in which education takes place, and staying alert to what they enable and what they restrict. Research can precisely test whether current assumptions about what education is for and the terms under which a good education is therefore being constructed, hold. It can also pose the question: in whose interests do these assumptions work, for whom do they not work so well? Knowledge grows in this way as initial ideas are developed and refined in the light of experience. Our understanding of the relationship between research and policy has certainly had to adapt in this way, to take into account the changing landscape and the new elements that research defines as relevant. We are not done yet.

Cool scrutiny rather than exuberant enthusiasm count. My description of the dislocations and divisions of labour that characterise the education field in England right now won’t translate directly into what is happening in Australia, Chile, Germany, the USA, or Scotland. But such points of comparison help sharpen our understanding of the local and context specific as well as what is generalisable to elsewhere, and on what terms. This way of thinking doesn’t depend upon a particular epistemological starting point, or a post-structuralist turn. It can be as easily understood from within a strong empirical position that grounds data in the observable facts and the accuracy of any measurements. This is well demonstrated by discussion currently underway within Psychology over the difficulty of translating robust findings from carefully controlled experimental studies into effects that can be realised elsewhere, when controlled and experimental conditions do not hold.

This has led one psychology journal in the US to suggest that researchers refrain from making recommendations for others to follow from such studies (Eich, 2014), a decision which has in itself led to considerable debate. Something similar is happening in the research community involved in RCTs as the difficulty of tracking and accounting for impacts become more widely recognised. Null results are proving far more common than might have been supposed, and indeed can act as a
necessary check preventing poorly evidenced interventions from gaining traction. The reasons why this is the case are intellectually interesting, from my point of view, not proof of a nonsensical starting point. Indeed, the capacity of each tradition to recognise and react to the unexpected, and what might seem to run against expectations is wholly to be welcomed. It shows the benefits of reflexive thinking in research. It also matters at a time when policy often seems to favour off the shelf interventions whose effects they believe can be guaranteed, at point of purchase, and which sanction minimal investment in the knowledge base of those who use them, whilst overlooking the professional judgement required to know which intervention might work best for whom, under what circumstances.

Conclusion

The policy discourse that education is now framed by has subscribed to the virtues of standard delivery of standardised curricula. It has held to the belief that the same inputs will invariably lead to the same outputs. That if we condense what good schools or good education systems do into bite-sized summaries, and pass them on to those that don’t do so well, all will be transformed. We have not yet reached the end of assuming that passing stuff along from one context to another will do the transformative trick. Indeed, the sequential shifts in policy-borrowing at national levels show one system continuing to pick up ideas that have run their course elsewhere.

Now is a good time for the education research community to take stock of current dilemmas, and unpick where current beliefs simply cannot hold. In pursuing such a critical edge in research we need to identify what are the key questions that matter most right now, not just for us, but for our many stakeholders: the communities that participate in education in different forms and in different institutional settings; the teachers who work in them; the broader communities who will benefit from what education at its best can bring.
Re-democratising education research means inviting critical scrutiny of what works in practice as well as in theory. That means sharing more clearly how the evidence-base that supports proposition x was made, and considering whether the assumptions underpinning a line of research still hold in the light of the evidence that comes from use. These are all crucial elements if we are to re-invigorate a socially just pedagogy focused on issues that remain hard to solve.

The interests of policymakers, researchers and practitioners are different. They are inevitably shaped by the different contexts in which they act, and the data this allows them to see. We need to find more profitable ways of working across these boundaries in the interests of the wider communities we serve. I would hope this article continues a process of re-shaping the debate about how research can most fruitfully engage with policy and practice and re-sets an agenda for change.

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