

# The Sleep of Reason Breeds Monsters: Data and Education Governance in England

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**Data are taken for granted: they are constantly in use to audit performance and make comparisons between teachers, schools, localities and nations. The prevalence of data may obscure some fundamental questions about their use and indeed their usefulness. A gap may exist between the policy ambitions that drive the constant effort to produce more and better system data and the practical and human constraints on data production and use. This *Briefing* reports on research that explored these issues, and also raises questions about how data may reconfigure power and influence in education policy making.**

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- ▶ Data have become central to education policy, indeed they may be understood as a form of governance of education;
- ▶ Policy-makers promote data use in all areas of public sector provision, and the apparent benefits of data use are widely known and discussed;
- ▶ However there are large financial costs and considerable demands in time and effort involved in collecting, circulating and analysing data, which raise some questions about its costs as well as its benefits;
- ▶ In England, the volume of education data collected, and constant changes in the way it is collected and analysed, may make it difficult to see which data are important, and to build knowledge from data, rather than drown in information;
- ▶ The speed with which data now move and the technical capacity of new systems means that data analysts at all levels – schools, local education authorities and the Department for Children, Families and Schools – are preoccupied with constant updating of information rather than with making sense of it;
- ▶ These factors, along with the policy direction that requires integration of services and thus of data, may displace local expertise and give undue weight to technical experts;
- ▶ Pre-occupation with data may create an expectation that trends are always in an upward direction, and create undue pressure from the centre on local and institutional education providers.

## Introduction

*'Yes, we are overwhelmed with data and then we don't use them enough. We go to the next survey and then we have new data and so on. Well, I think there is a great difference between the data that countries need for monitoring the quality of their systems, [and something] like the English system which is monstrous. I always ask them – what is the cost-benefit? Have you ever made a cost-benefit analysis of what you are doing?'*

**Int:** *'What is the answer?'*

*'They smile'*

This extract from an interview with a senior official in the European Commission draws attention to the explosion of data on education in recent years, and highlights the issues of the usefulness and impact of data. Are data displacing expertise, and are people (including education policy makers, managers and teachers, as well as parents and 'users' of education) drowning in information that they can't make sense of?

There is a good deal of research on the effects of quasi-markets and school choice in England, and on new public management, devolution of power and responsibility to schools. However research on the effects of the massive increase in the production and use of data that has accompanied these changes is scarce, especially in relation to the effects of the constant effort needed to produce more and better data. In this situation, statistical processes and skills become highly significant to policy-making at all levels—are other kinds of expertise displaced? Are statisticians the only people who really understand how schools are performing?

We are drawing here on some findings of a recently completed study of 'Governing by Numbers' in education in England and Scotland, that was part of a larger study of the production and use of data in quality assurance and evaluation (QAE) systems in England, Finland, Denmark, Sweden and Scotland. That project examined the relationship between data production and use and changes in the *governing* of education/learning in national systems (see *CES Briefing No.44* <http://www.ces.ed.ac.uk/PDF/Files/Brief044.pdf>). Here we focus on England, which offers the most 'advanced' case of data use, drawing on interviews (20) with officials and data analysts at central and local government levels, and on case studies in four local authorities in England.

## The Delivery Chain

The speed and scope of England's data collection and use now surpasses those of many other countries, according to a senior government analyst:

*'Because we have all this Key Stage Data and because it is longitudinal, we are practically, without boasting, we are probably the leading administration in the world as far as value-added measures and schooling are concerned.'*

To understand the growth and significance of data, it is important to understand the idea of the *delivery chain* as a principle in the organisation of public services. The delivery chain connects political promises made by a Minister to a series of benchmarks and targets that track the process of change and provide evidence of its achievement: it constantly needs new data. Performance against targets drives pupil and politician, as well as people located at all the interconnected links in the chain – teachers, schools, local authorities and, increasingly private agencies. This, we suggest, contributes to a new mode of governing education through data in England.

Data for this new mode of governing are produced in real time: the system is constantly 'live', requesting updates and new information, putting previously unrelated information together (as one weary local officer said 'just because its possible'). The internet transports these data rapidly, as a local officer from another case study authority illustrates:

*'We now use a system which allows schools to send, over the internet, any data – finance, pupils' register rolls, other data files – they can send them directly through folders and sub-folders ... the system can even analyse the input to see if it's complete. For example, it is able to pick up such things whether a, say, design and technology assessment for a particular child is missing from a submission of 200 pupils.'*

## Improving Trends

Given this level of sophistication, and the speed of data transfer, people working at all levels come to see data as representing a trajectory of improvement: but trends go down as well as up. This can create tensions between the authority and the central department, according to an analyst responsible for all school data in a large city authority:

*'I think the only issue I find that is challenging is when trends go down. There is an expectation that trends will always go up. We are dealing with children, not robots, unfortunately.'*

The same informant told us about the pressure to project upward trends and gave an example of the authority having set a target of 84% achieving KS2. However 84% had been achieved the previous year:

*'We sent that to the DCFS and that was coming out at 84% for next year as well. They said that couldn't happen, you have to be 85% ... we cannot accept that. They say you have to keep going [up] and in some years, you know ...'*

### **Intelligent accountability**

Data are central to inspection processes, and between 1997 and 2004 all schools in England were inspected at least twice by Ofsted. Improvement in overall academic attainment (or improvement in the capacity to perform in tests, according to some critics – see Goldstein 2004) combined with concerns about the costs in money and time have recently led to some simplification and streamlining of the system, promoted as 'a new relationship with schools' and 'intelligent accountability' (see *CES Briefing No. 43* [http://www.ces.ed.ac.uk/PDF Files/Brief043.pdf](http://www.ces.ed.ac.uk/PDF%20Files/Brief043.pdf)).

However this 'light touch' system still requires schools to produce data that analyse and interpret their overall performance in comparison to national standards and their comparator schools, and that identify the effects of changes in pupil profile or performance against benchmarks, in order to devise individual pupil and teaching and learning targets, and school targets. These need constant updating, as does the National Pupil Database, which holds data on every pupil in a state-maintained school and on younger children in nurseries or childcare if their places are funded by the local authority. These data are held at a very high level of detail and include name; age; address; ethnicity; special educational needs information; 'gifted and talented' indicators; free school meal entitlement; whether the child is in care; mode of travel to school; behaviour and attendance data. This results in constant activity by local government to offer data on its activity for scrutiny: it creates what a senior official at the DCFS called 'the bridge':

*'Where we corral all of this data and information and at a glance now across all local authorities in England you can go downstairs and look at a big screen and you can look across all the key performance areas and that's actually across all the social care areas as well as education. So at that level we're doing quite active performance management of the system and that's quite a powerful tool.'*

The design of a system that requires constant attention and responsiveness reflects a shift to self-regulation by local government and educational professionals-analysts, officers and teachers alike. Self-regulation has to be embedded and continuously maintained and reinforced. Through these strategies,

which appear to be technical, responsibility for constant (self) monitoring is installed in the system.

### **The Privatisation of Data production**

A further issue is that of the entry of new players into the data production scene. A large data production and information industry has developed, which policy makers claim will provide greater transparency and hence quality (Ball 2007). This is not always the experience of our informants, as a local authority data analyst reports:

*'And then they really messed it up, they had a company in doing the collection which might have been different to the other companies doing the collection ... so again you've got all these big companies blaming each other – one's responsible for one thing, one for another ... if something does go wrong, even though we are not supposed to be involved, we get the phone call and we don't say it's our problem, we sort it out.'*

These – often privately produced – systems remove quality control from local analysts:

*'We used to provide schools with software which would validate their inputs and work out Levels for them. And it would tell them that stuff was missing. It would make sure that incompatibilities were avoided ... Now SIMS will do that there's a calculate button at the end – but you actually have to PRESS that calculate button. So people can now send me incomplete data ... and I then I send them an email back saying there's a hole in it. And so they send it again and I open it and see that there's still something missing. So I send it back again and tell them that there's still something missing ...'*

### **Conclusions**

This briefing has raised some concerns about the current reliance on data in education policy-making, and illustrated some of the consequences of creating and maintaining a data-intensive system of performance management in England. Drawing on our research, we identify concerns about the displacement of local expertise, and illustrate here some of the ways in which the data machine takes on a life of its own and dominates the work of local government of education, to the extent that it may displace expertise and eliminate local knowledge. We have considered some of the consequences of this for local government, especially where there are new players involved, such as private agencies who exert considerable influence over data collection and use.

We have also drawn attention to the often invisible but hugely demanding work of collecting and, increasingly, integrating data. Demands on local government are becoming even more onerous with the development of integrated data for integrated children's services. The *Database State* (Andersen et al, 2009) notes the concerns that local authority staff have about the pre-occupation with getting a standardised system to work, which diverts energy and resources away from 'using effective professional approaches and analysis related to meeting the needs of the client family and child' (p18). Pressure from a 'live' system to be constantly up to date and responsive to demand puts very considerable pressure on the local authority, and maintaining the data system becomes an end in itself, and not the means by which better service provision may be enabled.

This discussion highlights the problems created by over-reliance on data in education and the dangers of data taking on a life of its own, that squeezes out local knowledge and contextualised expertise. In Baumann's words '*... there is no way to sift the grain from the chaff ... One bit of information equals another ... like other commodities on the market, they are for instant, on the spot and one-off consumption*' (Baumann, 2003, p41).

### Further reading

Ozga, J. (2009) Governing Education through Data in England: From Regulation to Self-Evaluation, *Special Issue of Journal of Education Policy*, 24(2), pp.149-162.

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### About this study

The project on which this *Briefing* is based is funded by the European Science Foundation (ESF) and the Economic and Social Research Council (ESRC) and runs from 2007-2009. There are two linked projects: the European comparative project called 'Fabricating Quality in European Education Systems' (FabQ) and the UK project that is nested within it: 'Governing by Numbers'. FabQ involves teams of researchers in Sweden, Finland and Denmark and the UK (England and Scotland).

For more information and working papers see [www.ces.ed.ac.uk/research/FabQ/index.htm](http://www.ces.ed.ac.uk/research/FabQ/index.htm)

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