SMATER EDUCATION GOVERNANCE

Tracey Burns, Senior Analyst, Organisation for Economic Cooperation and Development (OECD)  
Tracey.Burns@oecd.org

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Covering note: This paper was prepared for the Education and Skills Committee at the Scottish Parliament. As the purpose of this session is to test the evidence base for the Scottish Government’s programme of reforms for school education, this paper provides a brief overview of the OECD work on Governing Complex Education Systems. It draws from extensive conceptual and empirical work, including in-depth case studies of governance challenges in six education systems. Links to the full set of studies and working papers are provided at the end.

Biography: Dr Tracey Burns is a Senior Analyst in the Centre for Educational Research and Innovation of the OECD. She heads a portfolio of projects on the future of education, teaching, and childhood. Tracey holds a BA from McGill University, Canada and a MA and PhD from Northeastern University, USA. Her most recent publications are Governing Education in a Complex World; Education Governance in Action: Lessons from Case Studies and Trends Shaping Education 2016 (all 2016).
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Introduction

Governing multi-level education systems effectively requires governance models that balance responsiveness to local diversity with the ability to ensure national objectives. This is a delicate equilibrium, and one that is difficult to achieve given the complexity of the education system in many OECD countries. As a result, governance issues have moved up on the political and policy agendas, and countries are increasingly looking for examples of good practice and models that they can adapt to their own needs.

Five elements of effective governance

Based on extensive work with its countries, the OECD's Governing Complex Education Systems (GCES) project developed a series of five elements that together comprise the foundation of effective modern governance. The elements place the focus on processes that allow systems to adapt and respond flexibly to complexity. They align actors and activities and build on dialogue and stakeholder involvement. They keep knowledge and evidence at the core while at the same time supporting a system-wide vision of education and progress:

Figure 1. Elements of effective governance

This paper explores how they play out in education systems. It also investigates the challenges that remain the most difficult for countries to resolve. The goal is not to aim for a permanent government structure wherein all governance challenges will be solved. Rather, it is to embrace the idea of a *smart and strategic state*:

*It is not so much the size of the State which is at stake, but rather its governance. In other words, it is not so much a reduced state that we need... but a strategic state.*


In order to make this a reality, governance in education (and indeed in all public sectors) must be fundamentally revisited, moving away from traditional models and towards the five elements of modern governance portrayed in Figure 1. We turn to the first element now.

**Focus on processes, not structures**

When faced with calls to improve governance, the focus is often placed on structures, for example, through attempts to identify the most efficient number of governance levels for a specific problem or for the system more generally. This approach is motivated by a belief that there is an ideal structure that, once identified and implemented, will help solve (or at least reduce) many of the current governance challenges.

There is certainly a wide variety of structures to choose from. Across the OECD countries, the most devolved systems have up to four levels of governance, while in the most centralised there are only two levels that share the main decision-making power in education (Lassnigg, 2016; OECD 2012).

Improving or changing governance structures in any given context can thus take many forms. In many OECD systems, it involves increasing local autonomy to allow for more responsiveness to local needs. In other, generally highly devolved systems, there is a push to recentralise certain functions or create regional bodies to improve the capacity on the local level. But this approach can take a lot of time and energy without necessarily yielding lasting strategies to improve the effectiveness of the system.

Thinking through how systems are constructed and aligned remains a crucial element of successful governance. However, thinking of structures in isolation without connecting them to the processes that they are meant to support will not provide the kind of systemic and sustainable approach to governance that is required for our modern education systems.

**Flexibility and adapting to change and uncertainty**

Increased complexity – in levels of decision-making, in the numbers of stakeholders, and in the availability and use of data for evaluation and accountability – calls for a new approach to governance. Education systems are in fact complex systems – that is, networks of interdependently linked actors whose actions affect all other actors, and which evolve, adapt, and reorganise themselves. A complex system has the following core components (Sabelli, 2006, cited in Blanchenay and Burns, 2016):

- Behaviour is not explained by the properties of the components themselves, but emerges from the interaction of the components.
- The system is non-linear and relies on feedback to shape its evolution.
- The system operates on multiple time-scales and levels simultaneously.
Working with complex systems is difficult as the elements cannot be examined in isolation, but rather must be considered as part of a coherent whole (Mason, 2016; Snyder, 2013). In terms of education governance, this implies that effective policy planning and reform will start from a whole of system approach that takes this complexity into account. In addition, the dynamic and emergent elements of the system mean that its governance must be able to be flexible and adaptive to change. Efforts to govern using traditional linear approaches to policy-making will no longer suffice (Hallsworth et al., 2011).

**Flexibility and adaptability in education**

How does this work in education? When a complex system (for example, a school) undergoes a reform, there is potentially a wide variety of reactions to that change. Some schools will benefit from virtuous cycles (success breeds success), while others will be caught in vicious circles where difficulties bring about further difficulties (van Twist et al., 2013). Small initial differences in local contexts can therefore be exacerbated, creating a situation in which important discrepancies between schools or districts can persist and become hard to mitigate (Blanchenay and Burns, 2016). These discrepancies imply that careful attention must be paid to the particularities of each educational context, and that successful policy solutions must be prepared to adapt to this context and feedback. This is particularly important when thinking of how to make a reform process as efficient as possible, both in terms of cost effectiveness and also in terms of managing human time and energy.

This is of course one of the great challenges of educational governance: how to provide the guidelines and structure required when introducing a reform to allow for its goals to be reached, while at the same time allowing for local flexibility and professional discretion of teachers, school leaders, and local administration.

**Controlled change and policy experimentation**

The challenge of complexity is acknowledging that while no perfect solution exists, it is possible to take small concrete steps to make a difference. Policy experimentation can be an interesting opportunity to explore change in an education system in a controlled way. By directing the scale and design, risk and expenditure can be managed in a sustainable and ethical way. Policy experimentation also allows for adapting the policy cycle to reflect the dynamic nature and the intricacy of education systems. It ensures that, within the system, input from stakeholders is matched by a culture of constructive criticism that can identify both successes and failures (Blanchenay and Burns, 2016).

*Ecosystem experimentation* is an efficient way to strengthen the flexibility and adaptability of processes (Blanchenay and Burns, 2016). Embracing ecosystem experimentation involves moving from the standard current practice in education, where tests focus on a certain type of node (e.g., changing the teaching method for reading in all schools) in order to determine whether or not a particular intervention (in this case, a reading programme) is successful or not. In contrast, ecosystem experimentation focuses on self-contained parts of the systems (i.e., natural ecosystems) when testing a particular intervention. Importantly, the intervention itself can still be the same (for example, the efficacy of reading programmes), it is the size and placement of the intervention that differ (see Figure 2).
Building capacity, open dialogue and stakeholder involvement

A key element of successful governance is ensuring that stakeholders have sufficient capacity to assume their roles and deliver on their responsibilities. For example, as schools become more autonomous, headmasters have been given new roles and powers regarding planning, budget, and staff. In some systems these are entirely new responsibilities and actors must be given the support they need to grow into them. Even when a role is not entirely new, teachers, school leaders and other local actors may still need capacity building to hone their practice. An example is the use of data: in all systems there are more data available from system-level indicators, evaluations, and test scores, and capacity must be developed in order to use and interpret the data correctly. It is key to develop explicit capacity-building measures for educational monitoring, particularly in smaller municipalities with fewer resources (Busemeyer and Vossiek, 2015).

It cannot be forgotten that strong capacity building is time-consuming. Stakeholders’ needs must be considered from the very beginning rather than being introduced as a reactive measure when something goes wrong. Capacity-building needs vary considerably system-wide, and the types of challenges faced between and among districts, municipalities, schools, teachers, etc. can all vary. Capacity-building efforts must thus take these variations into account to ensure equity and efficiency across the system.

Stakeholder involvement and participatory governance

Participatory governance aims to improve shared vision and ownership, accountability, responsiveness, and transparency by involving a wide variety of stakeholders in the policy-making process. Opening up the policy-making process can yield a number of significant benefits (OECD, 2009a):

- Better and more equal policy outcomes
- Better implementation
- Greater trust
This is not an easy process, as it is difficult to engage the hardest-to-reach actors (Hooge et al., 2012). The failure to consider obstacles in the planning, design and implementation of stakeholder engagement practices gives rise to the risk of “missing stakeholders” (Alemanno, 2015: 135), which in turn causes efficacy and equity issues. Efficacy, because by failing to encourage the participation of all relevant stakeholders, co-creation practices fail at their main goal: to include a wide range of perspectives as input into policy making. And equity, because by failing to facilitate access for individual stakeholders or small groups, the policy is likely to dominantly reflect the views of only the most powerful stakeholders. Yet the input of these missing stakeholders can be among the most valuable for policy makers: small stakeholders often possess “situated knowledge”, gained from personal experience on the ground rather than through theoretical models (Alemanno, 2015: 135).

One of the more interesting changes in the participatory governance landscape has been the evolution of new technologies, which allow faster and easier access to more people than ever before. Although providing a powerful opportunity to facilitate and encourage stakeholder involvement and participatory governance processes, they also come with challenges (see Box 1).

<table>
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<th>Box 1. Co-creation and new technologies</th>
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<td>New technologies act as a driver and enabler of participatory governance. They provide the opportunity to reach out to a broader set of actors and to take their views and concerns into account, including those hardest to reach. Open public consultations on digital platforms and social media such as Facebook and Twitter are some of the tools used by governments at all levels to engage a broader set of actors.</td>
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<td>However, new technologies also come with new challenges. The opportunity for almost instant feedback means that parents and other actors are not inclined to wait and see what is effective; they expect the best education for their children and communities now. They can use social media to put direct and instant pressure on schools and officials. The danger is that expectations tend to rise faster than performance, and there is a temptation for elected officials to operate in the short-term even though research has demonstrated that the effects of a reform can take a significant amount of time to bear fruit (Burns and Köster, 2016).</td>
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<td>Despite this, there is no going back: stakeholder involvement creates a shared responsibility that strengthens accountability in the system. It is through the involvement and engagement of a diverse group of actors that educational governance will be able to continue to evolve along with our societies and schools. There is thus a need for mechanisms to include all stakeholders and voices (not only the most vocal or technologically savvy) in the governance process, and to design ways to strengthen participatory governance mechanisms. This will also require working with less active or less confident stakeholders to build capacity and empowerment to enable them to take part in the process.</td>
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A whole of systems approach

In complex systems, nothing can be done in isolation, as it is the relationships between the parts that are essential. Education systems must resolve tensions between potentially conflicting forces such as accountability and trust, innovation and risk-avoidance, and consensus building and making difficult choices.
A whole of systems approach works to align roles and responsibilities across the system, improving efficiency as well as reducing potential overlap or conflict. In order to change policy and practice on such a fundamental level, there needs to be a general agreement among stakeholders that something must change. Part of securing a general agreement is developing the evidence base that allows for such a discussion, in order to gain a real understanding of the current state and strengths and weaknesses in a given system.

The importance of time

Increasing diversity of actors in the system comes with diversity in expectations, and different sectors operate on different time-scales. For example, elected officials have to operate on shorter time scales than civil servants, and teachers might have different expectations for the time involved in change than parents and students. Researchers operate on a more deliberate time scale from almost all other actors.

These different time scales can give rise to different pressures in the system which can systematically act against long-term strategic thinking. For example, quick-effect changes (e.g. providing students with electronic tablets) might be more appealing to elected officials as elections loom closer, while parents may favour longer-term less risky changes (e.g. reinforcing the teaching staff) and researchers may prefer more risky longer-term experiments (e.g. teaching a new reading method). Paradoxically, moving from appointed to elected officials as a way to increase local accountability in the education system, for instance in school boards, might result in an undesirable preference for more visible short-term solutions from those officials, given the requirements of the electoral cycle (Blanchenay and Burns, 2016). Time is thus a key element of effective governance, yet it is one of the scarcest resources in a fast-paced political cycle.

Figure 3. The knock-on effect of a lack of time on whole of system functioning

![Diagram showing the knock-on effect of a lack of time on whole of system functioning]


A lack of time also has an impact on how long programmes should be allowed to continue before a decision is taken on their effectiveness. Previous work on systemic innovation found that decisions about whether to continue to fund a particular initiative are often taken before results of a programme evaluation are available, and that the evaluation step is the most likely to be skipped or omitted if there are time or financial constraints (OECD, 2009b). Budget timeframes and grant agreements often are set to two to three year cycles, which research again suggests is not long enough to see the effect of a particular reform in its entirety.
One of the trickiest questions for education governance is when a reform is considered a success or failure. If there is no immediate success, is it better to end it, or to wait and see if it might produce results in a longer term? There is a scientific question here, regarding the effectiveness of the process. But there is also a political and ethical element involved as it is difficult to justify continued spending if short-term results are poor. However, it is also possible that strong short-term results might not be sustainable, or representative. The results from an intervention with a set of early adopters, for example, might be different than with another set of actors.

In a fast-paced world, where expectations are likely to rise faster than performance, politicians and policy makers are scrambling to keep up with immediate demands for improvement. Long-term strategic thinking is thus often considered to be a luxury, or something to be engaged in when time frees up from the immediately pressing issues. And yet it is required for whole of system thinking, one of the essential elements of modern governance.

**Evidence, knowledge, and the use of data**

For most OECD countries, it has become clear that promoting the use of evidence in policy making is not the same thing as ensuring its use. This is due to a number of different issues (Blanchenay and Burns, 2016):

1. Too much data can obscure information pertinent to decision-making or render it unusable by its sheer magnitude. As O'Day (2002) points out, the abundance of information may be counterproductive, as “teachers and schools may metaphorically and literally close the door on new information, shutting out the noise”.

2. Even for standard measures, important information might also be only partially collected (for example, reasons underlying student drop-out or issues with teacher retention).

3. There might be few incentives for collected data to be shared widely, especially if there is a concern that it could be used in a negative manner (for example, in systems where there is strong competition for students between schools, the weaknesses of a particular school might be disguised or otherwise presented to avoid injuring the reputation of the school).

This is a serious issue. Increasing the availability of data in order to increase transparency and accountability to a broader range of stakeholders has unexpectedly given rise to concerns about increasing inequity between advantaged and disadvantaged students. In most countries, upper middle-class and middle-class families (or parent(s) with higher education, higher professional positions and higher income) are the ones that are most aware of how to actively use the education system for their own interest and benefit (Taylor, 2009). They are more likely to have the capacity to use school performance data to place their child in the best-performing schools. If changing schools is not possible, middle and upper-class parents are more likely to demand (and successfully lobby for) change in the system (van Zanten, 2003).

The equity issue also plays out administratively. Some districts or municipalities might be more likely than others to fully use available data – often those that have better capacity to analyse and interpret such data. It will come as no surprise that these are generally the larger and better resourced authorities. Increasing transparency by making data public thus
can have the unintended effect of increasing the divide between the advantaged and the
disadvantaged, whether they be administrations, schools, or families.

Peer learning and networks can be a good way to build the capacity of the smallest
municipalities and schools to use research knowledge and apply it in practice. And having a
clear and easy way to communicate the effectiveness of a school or system is a very
powerful way to motivate a broad set of stakeholders around a school or community.
Despite the various challenges, it is important to get it right.

Concluding note

Governing multi-level education systems requires governance models that balance
responsiveness to local diversity with the ability to ensure national objectives. This is a
delicate equilibrium, one that is difficult to achieve given the complexity of the education
system in many OECD countries. We have argued that effective modern governance keeps
the focus on process and allow systems to adapt and respond flexibly to complexity. It
aligns actors and activities and builds on dialogue and stakeholder involvement. It keeps
knowledge and evidence at the core while at the same time supporting a system-wide vision
of education and progress. Together these elements combine in a smart state, which is
flexible, adaptive and focused on learning.

Creating the open, dynamic and strategic governance systems necessary for governing
complex systems is not an easy task. Through work on complexity, change and reform and
new modes of collaborative networks and decision-making, we can set the agenda for
thinking about the inclusive, adaptable and flexible accountability and governance
necessary for governing complex systems in today’s global world.

References and further reading

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