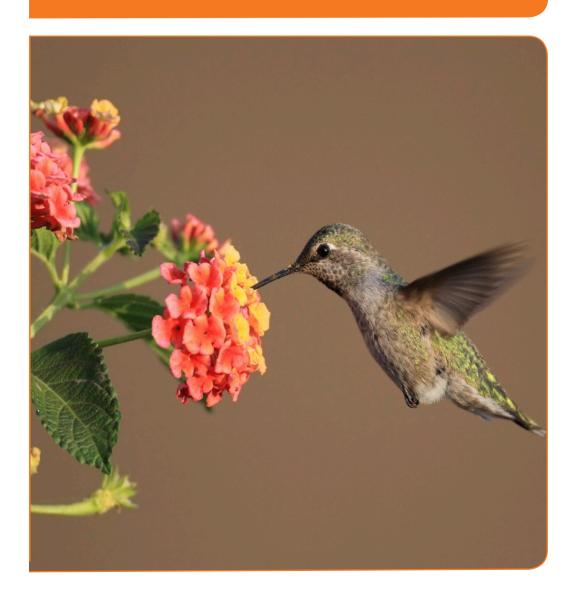
innovation

Honest Brokers: brokering innovation in public services

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Introduction

A new type of organisation is emerging within the world of public services. They are known as 'innovation brokers'.1 Not a very glamorous title, and not necessarily a title that these organisations would claim for themselves, but they are modelling themselves on intermediary organisations that have existed in other sectors for years – such as innovation and science parks, incubators, accelerators, exchanges, labs and studios.²

Don't be put off by the jargon. These guys are not as 'corporate' as the language suggests. They are passionate about finding radical solutions to long-term social problems such as chronic disease, obesity, climate change and teenage pregnancy, and the people running these intermediary organisations are more likely to have come from Government, universities and the third sector than an international management consultancy. Their goal is to achieve innovation at scale within public services.³

This booklet uses the education system as an example of a public service with moderate levels of innovation where innovation that goes to scale is rare. It explores the history of educational reform, looks at how some reforms can act as a brake on certain types of innovation, and analyses the drivers and barriers to innovation. It identifies a number of brokering organisations that have succeeded in fostering innovation in education, and draws lessons

for how innovation in other public services could be better supported.

We explore innovation brokers in some detail – looking at what they are, what they do, and why they are needed to support innovation in public services.

We argue that these innovation intermediaries are emerging in response to a set of barriers that inhibit the relationships between different organisations. These barriers are caused by the complex nature of social innovation, the existence of monopolies, funding issues and accountability systems that undervalue innovation.

Innovation brokers help to mobilise innovations, identify opportunities that the current system undervalues and they broker relationships between disparate parts of the system. These organisations mediate both knowledge and relationships for their clients.

In particular, they broker relationships between 'innovation creators', 'innovation seekers' (such as commissioners of services), investors and policy makers. Their work is to affect the culture of a system, to make it more conducive to the development and spread of innovation. Part of this includes advocacy for the involvement of the public and service users in innovation, a role, which is necessary in systems where the public and service users pay for the services they receive indirectly through taxation.

We recommend that
Government seeks to create
propitious market conditions
for innovation intermediaries
working in public services. It
should attempt to stimulate
demand for innovation brokers
by relentlessly communicating
the innovation imperative,
regulating sectors in ways that
encourage innovation and
use public money to leverage
more investment. It should

also encourage leaders to grow the capacity within their organisations to firstly work with intermediary organisations and more importantly to manage the brokered relationships with other innovators, universities, policy makers, investors, and businesses necessary for innovation to flourish.⁴

The emerging market of innovation intermediaries working in public services is a fragile underdeveloped market of small to medium-sized enterprises (SMEs) that could be damaged by unhelpful policy making. Competition and collaboration are to be encouraged in the sector, while bureaucracy, monopoly, risk aversion and high barriers to entry must be avoided. Government should attempt to support the emergence of innovation intermediaries in similar ways that it has encouraged intermediaries in science and technology sectors.

Innovation in public services

Britain has led the world in reforming public services, albeit with mixed results. Our health service is the most centrally managed system in the world, and our education system is the most measured, assessed and inspected in the world. After 20 years of a preoccupation with public management techniques, public services are now supported by a large and expensive 'improvement infrastructure'.

The public sector is not short of inspectors, auditors, regulators, consultants and bureaucrats whose job it is to monitor, measure and evaluate performance. There is also no shortage of people to provide support, advice, and training to leaders and staff in delivery organisations about how to meet performance and efficiency targets. This 'improvement infrastructure' has succeeded in driving up performance, improving quality and making a measurable difference to performance indicators

This improvement infrastructure will not produce the kind of innovation that radically transforms outcomes for people on a large scale.

There is no doubt that after 20 years of Government-led improvements in public services that more of the same approach will not tackle the most intractable problems, nor will it tackle a new set of long term social problems. The challenges of climate change, an ageing population, chronic disease, and violent gangs will not be met by improving existing services. New ways of tackling these problems are needed.

The need to improve existing services has not disappeared but it is matched by an innovation imperative. The public increasingly expect Government to act to solve new complex social problems such as climate change, paying for long-term care in an ageing population or tackling gang culture among young people. Secondly, the innovation

imperative is driven by an economic argument: public services have received unprecedented investment over the last 10 years. Now that there is a much tighter fiscal climate, improvements need to be created without ever-increasing public spending. The traditional approaches to public investment and centrallydriven reform have already reached their full potential. Even if health and social care services were to universally adopt current best practice, and efficiencies were to be squeezed out of the system year on year; within 30 years, these systems (and other public services like them) would become unaffordable. 5 The innovation imperative is also an economic imperative.

This type of innovation is potentially disruptive. It can disturb existing patterns of provision and lead to major shifts in resources. Vested interests often seek to resist such change and maintain the status quo. This type of innovation is also risky. The full impact of such innovation is often uncertain.⁶

This type of innovation occurs over long time horizons. These changes can take place over a 10 to 20 year period – far longer than the career of any politician, but not necessarily longer than the period a political party may be in power.

This type of innovation is also rare in public services – and for good reason. Geoff Mulgan, in his excellent study of innovation in public services⁷, outlines many good reasons why such innovation in public services is rare:

- There is a lower tolerance for risk where people's lives are involved and much of the public sector delivers far more essential services than the private sector.
- The public want their public realm to remain familiar, legible and coherent. Constant change would be a nightmare.
- » Tried and tested ways of doing things are often preferred, and even the best ideas benefit from being tested out and adapted in the real world.

» The public sector should be a stable force, a buffer against too much change – a good deal of innovation and reform in public services is driven through much too fast or abandoned too quickly

But, he rightly points out, there are also some bad reasons why this type of innovation is hard to come by in the public sector:

- » no-one's job few organisations have senior leaders responsible for innovation
- risk aversion the culture in Government discourages risk taking rather than rewarding it
- too many rules bureaucracies are designed to stop capricious and unpredictable actions
- uncertain results initially many new technologies perform poorly when compared with old ways of doing things

- » high walls many of the potential innovations cut across organisation or professional boundaries but because power and money are organised in silos these are the innovations that are least likely to win support
- unsuitable structures

 monopolistic sectors like the
 prison service tend not to be
 very innovative. Sectors with lots
 of very small players tend to be
 good at incremental innovation.

 Sectors with many small players

 and a few large players tend to be
 better at more radical innovation.

An innovation infrastructure for public services is needed to militate against some of these problems and in some cases remove them altogether. To enable us to better understand what such an emergent infrastructure might look like, we study innovation in the education sector, which since 1870 has provided public education and been responsible for increasing the life chances of millions of people.

A closer look at innovation in education⁸

Innovation in education demands major cultural change – in individual belief and behaviour, in attitude and expectations, and in relationships. Education is a social and value-laden process, and innovation within it is not a high-tech pipeline with controllable variables and inputs and easily measurable outputs. Moreover, it needs to be sensitive to context – children, families and communities are all different and require different ways of working to achieve the same high outcomes. This is not so much a complicated, as a complex business.⁹

We argue that successful innovation must occur in at least four different dimensions:

- » how students are taught and how they learn
- » how, when and why students are assessed
- what knowledge and skills the students learn the curriculum
- » how education is organised.

Although each of these is interrelated, change too often focuses on one to the exclusion of others

The education system in England more readily produces incremental than radical innovation. Radically different models of curriculum. assessment or school organisation are rare and usually fail to spread through the system. However, schools and teachers constantly adapt and improve their practice to meet the needs of pupils. There is a large volume of small-scale, low-level incremental improvement in the way schools organise themselves, the curriculum they offer and the way they deliver it but work like this is not readily diffused through the system. In many cases it does not even spread throughout an organisation. Where innovation does spread more easily, it usually originates from central Government, like the introduction of the National Curriculum or national testing. Again, these system-wide innovations tend to be incremental rather than radical – built on existing curriculum and assessment practice and knowledge.

We suggest that the nature of innovation in education has changed dramatically over the last 40 years. We argue that there are three chapters in its story.¹⁰

Chapter 1

The 1960s and 70s saw localised experimentation and diversity in the education that schools offered, often fostered by universities and Local Authorities. The Schools Council developed innovative curricula. diffused in part through the system. Developments in educational theory led to changes in how children were taught and there were some high profile experiments in the way schools were organised, including what were termed 'experimental schools'. However, the absence of systematic attempts to measure effectiveness and the absence of an architecture or incentive that could harvest and facilitate the spread of innovation system-wide led to this era being criticised for 'allowing 1,000 flowers to bloom'. Some guestioned whether this was genuine or rooted innovation at all.

Chapter 2

The 1980s saw the source of innovation shift from the local to the national level, 1988 saw the introduction of a national curriculum - ending decades of localised autonomy over what children learnt at school. This was followed by national testing, national inspections and finally the introduction of the National Literacy and Numeracy Strategies in 1998 and 1999. The latter changed the way teachers taught English and Maths in primary schools. The strategies used data, funding, teaching resources, training, consultants and targets to change what teachers did.

These national strategies are the epitome of centrally driven innovation, and led to significant improvements in children's attainment at age 11. The strategies brought other, less visible, benefits¹¹ that enabled Government to explore different ways of building on teachers' newly-enhanced expertise. Rigorous training, support and datadependency in the strategies led to

new ways of thinking and working that relied upon:

- » regular use of data to inform planning
- » direct engagement with evidence-based practice
- re-conceptualising the whole
 school adults as well as children
 as a learning organisation.

Educationally, these system-wide innovations of the 1980s and 90s were more incremental than radical - they were all grounded in practice that already existed in some, but not all, parts of the system. They also connected the research and knowledge base with practice. From this perspective they were models of incremental improvement with highly planned and developed strategies for 'spread'. However, they were radical innovations in education policy making – never before had central Government taken control of issues previously left to schools and Local Authorities. Most significantly of all they created the capacity to measure their own effectiveness through the

systematic collation of data on quality of education and ultimately on their impact on children's attainment.

Chapter 3

The third chapter in this story brings us, more or less, to the present day. It describes a hybrid model of innovation, combining local and national elements. It is both top-down and bottom-up. This paradigm has been termed 'disciplined innovation' in which the effectiveness of innovation at school level is measured and can be taken to scale, not through central prescription and guidance, but through collaborative networks, multi-school Trusts and federations of schools.¹²

This approach is supported and facilitated through 'middle tier' organisations delivering programmes that effectively support, foster and discipline innovation at a local level. The Specialist Schools and Academies Trust (SSAT), the National College for School Leadership (NCSL) and the Training and Development Agency

for Schools (TDA) have fundamentally different roles to play in the system but all undertake research and development, provide access to pooled resources, offer structured learning opportunities for education professionals, use innovation models and processes, provide access to research, and enable evaluation. This is true, too, for some Local Authorities. This era of educational innovation was symbolised by the creation of The Innovation Unit, set up within the Department for Education and Skills (now the Department for Children, Schools and Families) in 2002, to 'play a key role in supporting schools to develop innovative projects and to put their emerging ideas into practice ... [and to] disseminate good practice across the whole school system.'13 It was a practical embodiment of Government's intention to encourage schools to innovate and take the lead in improving practice, all within a clear accountability framework.

Why are there few innovations that radically transform outcomes for children in the education system?

While the system has experienced a series of significant changes over the last 30 years, none of these have succeeded in creating a high innovation system that dramatically improves outcomes for the most disadvantaged young people in Britain. The achievement and participation rates of young people from disadvantaged groups are persistently low. We have yet to configure our education system (and wider children's services) in a way that systematically addresses at scale the needs of children from poor families, different ethnic groups, children in care, children with special educational needs, and young people not in education, employment or training, and other disadvantaged groups.

We argue that it is the interplay of different drivers and barriers to innovation in education that has generated this situation. These drivers and barriers of innovation have been subject to extensive consultation¹⁴ and analysis.¹⁵ Broadly speaking, the key influencing factors can be summarised under the headings of political climate, culture, data, leadership and technology.

Political climate

The political climate seriously affects innovation within education Both central and local Government can be powerful drivers of innovation - articulating, as they see it, the public's desire to see improvements in performance. Typically they use regulation, funding, guidance, performance management, and exhortation to stimulate change in the system. However, these mechanisms are blunt instruments. When used well they can produce genuine innovation – as in the Literacy and Numeracy Strategies, or the reform of the curriculum for 14-19 year olds. However, the same

tools can also hinder innovation when they combine to create a blame culture that inhibits risk taking but encourages manipulation for short-term advantage and favours short-term gains over long-term investment. Another risk arising from the political desire to see short-term change is the over-proliferation of new central initiatives, the discontinuation of prior initiatives, and the incoherence and inertia created by confusion and lack of a long-term strategy.

Culture

One of the greatest barriers to innovation in education is the poor relationship between research and development – institutionalised by the separation of academic research in universities from professional practice in schools. ¹⁶ This has bred a failure to recognise within each institution the forms of knowledge that the other possesses: academia values formal research knowledge published in academic journals; schools value informal knowledge embodied in practice. The result is that schools are weak consumers and

even weaker producers of educational research, while universities are traditionally strong at offering research as sociological critique and weak at offering research that is used widely in practice. Finally, the whole sector is poor at engaging with the knowledge and research base beyond education.

Innovation at a school level is greatly affected by the nature of the relationship between different schools. This issue has become highly politicised in recent years by the debate about competition and collaboration in education. The innovation literature shows that getting the right balance between them greatly affects capacity to innovate within a sector. The story we described of innovation in education shows how too little competition in the 1960s and 70s and too much in the 1980s and 90s failed to stimulate innovation and the diffusion of innovation at a school level.

We now see some rebalancing of competition and collaboration with

increased competition from newly created schools, greater diversity of schools, and a willingness to close and reopen schools. This is matched by growing levels of collaboration between different phases (primary, secondary, further education), between different agencies (education, health and social services), and between schools with the same specialism, values or challenges. Groups of schools are now forming federations that formalise their partnership working, while others are creating trusts that formalise their partnerships with universities, local employers and charities.

As with many other public services, the true costs of failure in education are not felt within education organisations but in other sectors (social care, health, criminal justice, benefits, drug and alcohol services) and especially in other organisations' budgets. These hidden and distributed costs reduce the pressing requirement for innovation – they dampen the innovation imperative.

Data

Innovation in education should be driven by the needs of learners. The volume and quality of pupil level data expressing the needs, achievement, and progress of students has grown dramatically in recent years, made partly possible by the declining costs of computer memory and processing power. This is an important driver. Successful innovation depends upon clear identification of problems and the effectiveness of possible solutions.¹⁷ The gains made by the National Strategies would have been neither possible nor visible without efficient measurements of baselines and outcomes. And yet this data must be handled carefully. In a climate that is still infused with competitiveness it is easy to use it in ways that undermine or obscure real achievement – the introduction of a value-added element to school league tables is a late remedy to one aspect of this problem. Public availability of test outcomes can have the effect of narrowing teacher outlooks so that teaching to pass

tests can assume priority over delivery of a high quality education. The misapplication of data, based on inappropriate criteria is a continuing problem. 18 Finally, radical innovation is not just hampered but actually prevented by the failure to develop new measures of achievement that lack the weaknesses of current standardised testing. Recent reforms of the 14-19 curriculum and assessment models were a missed opportunity to introduce real, radical innovation into A-level and GCSE assessment.

Leadership

Leadership at all levels in the system is essential to innovation. Since 1997 there has been a considerable investment in leadership, for example through the establishment of NCSL and through clear articulation of expectations about leadership qualifications. This has been coupled with greater emphasis on self-evaluation in Ofsted's inspection criteria and an increasing focus on effective leaders supporting improvements

beyond their own school and locality (Primary Strategy Consultant Leaders, School Improvement Partners and National Leaders of Education). School leaders need to have a clear understanding of their own strengths and weaknesses as well as those of their staff. Failure here was one of the deficiencies that prevented the National Strategies from delivering all that they promised.¹⁹

Overall, standards of school leadership are good, with Ofsted judging that leadership and management are at least satisfactory in most schools and good or outstanding in over 60%.²⁰ Nevertheless, there remain significant skills gaps in school leadership and in some of the Government machinery that supports its work. Leaders need to model disciplined risk taking and willingness to collaborate with all stakeholders. But risk taking without the complementary skills of project management and evaluation opens the door to a return to undisciplined and uninformed innovation and consequent failure to distinguish between what works and what works best. 21, 21, 23

Technology

It is surprising how few disruptive technologies there have been in public education since the advent of the printing press. Much of the current investment has increased productivity and efficiency by automating existing practices. Some technologies have incrementally improved practice in schools, such as the use of electronic whiteboards leading to more interactive, wholeclass teaching, but the fundamental approach to teaching remains the same. The impact of technology is, as ever, mediated by the capacity of people and organisations – their knowledge, skills and outlook – to perceive what is possible with new technology.

Some of the technologies designed and adapted specifically for educative purposes, such as some virtual learning environments and learning management systems – work only to reinforce the traditional paradigm of education. They codify and embed existing practice in often proprietary systems that prevent teachers and

learners from adding, changing and modifying content – ensuring that they remain consumers rather than producers of learning products and resources. They fundamentally inhibit distributed innovation. The jury is still out as to their overall value.

Conversely, the use of 'generic workplace technologies' has in fact fundamentally changed the way children approach ideas generation and knowledge creation – even using common word processing has been significant in helping learners change the way they learn: digital opportunities to save, change, edit, return to, resave, manipulate, share and distribute are taken for granted – although they were so much harder using analogue technologies. The use of networked technologies in education that enable teachers and learners to be connected at any time at any place to other people is similarly transformative. It is often not the cutting edge technologies that make the greatest difference, but the application of technologies that have been around for some time, which

are then applied and configured for a particular group of learners in a completely new way.

The technologies with the greatest innovative impact on education are perhaps those that have supported the deinstitutionalisation of learning. Learning outside school has, for example, been supported by text messaging, instant messaging, social networking sites such as Facebook and Bebo (depending on your age), search engines such as Google and Just Ask, online sources such as Wikipedia, image and video sharing sites such as Flickr and YouTube and access to mobile technologies from laptops and iPods to mobile phones. Fach of these has contributed to the development of an unstructured, unregulated learning environment that provides real opportunities and possible threats to young people.²⁴ That environment also has significant potential to further democratise learning. Innovation at the margins, as seen here, can often have the most radical impact on the mainstream education system.²⁵

Managing drivers and barriers to innovation

The interplay between these drivers and barriers to innovation in education explains the difficulties of innovating at scale within the sector. However, there have been some interesting examples of recent success involving intermediary organisations in the education sector that have systematically managed these competing drivers and barriers to innovation. Examples include:

- » SSAT's programme of development and research in networks of schools focusing on different dimensions of personalising learning
- » RSA's development of a new competency based curriculum for schools called *Opening Minds*
- The Innovation Unit's Next Practice Programme for schools, colleges and collaborative networks, developing innovative practice in parental engagement,

- system leadership, community engagement in learning and personalising learning
- » Futurelab's work on enquiry-led learning and student-centred curriculum called Enquiring Minds
- Creative Partnerships engaging the creative and cultural sector most systematically in school based learning
- » Musical Futures run by the Paul Hamlyn Foundation that supports innovative pedagogical approaches to teaching music
- » numerous innovation programmes – combining both development and research – led by universities, Local Authorities, charities and philanthropic organisations.

These intermediary organisations have enabled scaleable innovation by supporting and challenging practitioner innovators. They have:

» encouraged and facilitated collaboration between innovators, creating diverse networks for

- innovation that stretch beyond local schools and beyond education
- » encouraged and enabled innovators, often working in delivery organisations to engage with the research and evidence base, engage with leading practice from elsewhere, and engage with innovation in unrelated sectors
- w used their scale (operating as they do with many different schools, colleges and other providers) to collect data and commission research and evaluation that would never be possible at the level of the individual provider
- invested in leadership development and reduced the risk of innovation to individual organisations and leaders partly by granting permission to innovate (especially important within a highly transparent and publicly accountable system) and partly by allowing risk to be shared by different organisations.

Our hypothesis is that these innovation intermediaries have an important role to play, not just within education but also within wider public services – they could be an important and underdeveloped part of an innovation infrastructure within sectors like health, education and social care. They seem better placed than large bureaucratic Government departments and monopolistic Government agencies to support and stimulate innovation on the ground. They also provide the organisational capacity necessary for the testing and diffusion of innovation that individual providers lack. So what exactly are innovation intermediaries, what do they do, and why are they needed?

Innovation Intermediaries

Over the last few years a number of "intermediary bodies" have been established or developed to support innovation in public services. These range from units within or at arms length from Government departments (NESTA, NHS Institute for Innovation and Improvement) to organisations spun off from Government Departments (eg The Innovation Unit) to completely independent entities (eg The Young Foundation). In addition, many consultancies and think-tanks, commercial and non-commercial, provide assistance to local innovators. ²⁶

Innovation intermediaries help innovative organisations develop and spread their innovations, usually to other organisations. They seek to grow the number of practitioner innovators – providing them with the encouragement, tools and social relationships they need to be more innovative. They also help organisations identify problems that they have, search for solutions

elsewhere and then absorb and acquire those innovations. Their clients pay for this support in a range of different ways:

- on a time and materials basis
 as used in the professions and represented as an hourly rate
- » on a commission basis as used in brokerage organisations, and represented as a percentage of the value of a deal
- on a subscription basis as used in calculating the cost of joining a network and having access to the services provided by network mediators
- » as a shared cost on the basis of terms and conditions for eligibility for a Government grant.²⁷

Innovation intermediaries are already well established within high technology sectors. The leading academic in this field, Henry Chesbrough, describes how intermediaries operate as either agents working for one organisation or as brokers and market makers trying to bring different organisations

together in the innovation process. Four examples of innovation intermediaries that have become very familiar to the business world: science parks, business incubators, technology transfer companies and innovation agents.

Science parks

Science parks provide facilities in or near universities, higher education institutes or research centres, for enterprises that are trying to turn research into business propositions. Parks provide premises, infrastructure, creative and enterprising environments and, probably most importantly, neighbourly contact with other innovators, organisations, investors and entrepreneurs working in hi-tech and science industries. Key to their success is the quality of their director and the team that provide inspiration, challenge and support to the organisations using the park. Although Cambridge Science Park built outside Cambridge University is the most well known example in Britain, probably the best example of a 'science park'

dedicated to organisations tackling social and environmental challenges is the hub (www.the-hub.net) which provides shared office space for social entrepreneurs using an innovative charging structure to make space affordable to start up social enterprises.

Business incubators

Incubators provide support for startup organisations that are trying to turn an innovative idea into a viable business. They provide support in the entrepreneurial process, especially support with business planning, access to investment, coaching in management and leadership, and relationships with a diverse network of people including other entrepreneurs. The Health Innovation Accelerator set up by the National Endowment for Science, Technology and the Arts (NESTA) and the Young Foundation is designed to support start-up social enterprises in the field of chronic disease.

Technology transfer companies

Technology transfer companies help organisations to commercialise their research and knowledge by turning their intellectual property into products and services. They provide support in a number of different areas including business planning, project management, contracting, evaluation, and they help organisations manage and protect their intellectual property for example through licensing and patenting. They also help organisations attract investment.

Innovation agents

Innovation agents help organisations to absorb and adopt innovations that were developed by other organisations. Most small and medium sized organisations lack the managerial capability to absorb and adapt innovations from elsewhere. In particular, they lack the capability to recognise their own need for innovation, to explore and compare innovations generated by others, to select and acquire innovations from other organisations and to implement innovations successfully.

Why do we need innovation intermediaries in public services?

Innovation intermediaries are emerging in public services because organisations in search of innovative solutions to social problems are struggling to identify, engage and partner with other organisations that have developed potential solutions to these problems.²⁹ This can happen in a multitude of ways:

- » Government departments lack intelligence about what innovative practice is happening on the ground.
- » Social care departments in local authorities find it difficult to access what is happening in other locations.
- » Schools have difficulties engaging with universities and the research and evidence base they generate.
- » Charities working with excluded young people find it difficult to convince commissioners of

- services for young people to 'try a different approach'.
- Innovative projects rarely develop and share their work with innovators from other sectors, eg health, social care, housing or education.

There are three main explanations for why organisations struggle to form relationships with one another in pursuit of innovation:

- » the nature of social innovation complex social problems require complex solutions
- » the power of monopolies to resist innovation
- the undervaluing of innovation

 existing systems of funding and accountability in public services
 do not value innovation.

Innovations that tackle the most intractable social problems are complex. They need to adapt to different situations and contexts and they need to manage the risks posed by changes in their environment, such as changes in policy, resources and personnel. This complexity increases

the transaction costs between organisations that are either looking for or generating innovations.

This problem is compounded by the many monopolies operating in public services, which tend to lock systems into traditional approaches that resist innovation. Some monopolies (like the police) have a monopoly on the supply of a particular service. Others, (like Local Authorities) are monopoly commissioners of particular services – where a quasi-monopoly exists on the demand side, as is the case with libraries, refuse collection and so on Such monopolies can be the most legitimate and cost effective way of delivering services, but the barrier they present to innovation remains a problem. These barriers are being broken down in different ways: by the introduction of practice-based commissioning and personal budgets into the commissioning of health and social care, creating competitions for new entrants to set up new schools, and encouraging new providers to run prison and probation services for example.

Finally, the true cost of failure. and therefore the true value of innovation in public services, is not fully recognised by extant funding mechanisms or accountability systems. Most funding mechanisms struggle to shift financial resources away from old models of delivery to new, more effective ways of doing things. Most accountability systems are not able to measure the benefits of new approaches because the system of measurement was designed to measure the performance of an old model. Of course, most funding mechanisms and accountability systems do evolve over time to try and accommodate new ways of doing things – necessarily they change slowly, and more often than not, innovations have to exist at the periphery for many years, supported by fragile and unsustainable funding and a tiny number of enthusiastic advocates. Such innovations find it very difficult to contest the financial resources that support existing practice and they have to combat the systems aversion to trying something different - to taking a risk.

How do innovation intermediaries help?

Innovation intermediaries try to overcome the barriers created by the nature of the innovations, the unrecognised value of innovations and the power of monopolies. They identify opportunities for innovation that the current system undervalues. They seek new ways of financing an innovation and measuring its benefits. They try to reduce the risks and increase the rewards of the innovation and importantly they broker relationships that mobilise an innovation

Intermediaries in public services attempt to mediate both knowledge and social relationships. They broker different types of specialist knowledge that innovators often lack; such as how to set up a business, technological expertise, marketing and communication skills. The market for these skills in public service innovation is very undeveloped, demand is highly differentiated and lacks the scale to purchase this knowledge independently – hence

the need for brokers. Secondly, they broker relationships between a wide range of players for whom the costs and risks of networking and collaboration are high. Brokers provide a platform that lowers these costs and risks. There are four types of social relationship that innovation intermediaries seek to broker in public services.

Brokering relationships

The first is the relationship between 'innovation creators' and 'innovation seekers'. In the private sector this is often a relationship between small, creative organisations and largescale organisations. The technology sector is full of tiny firms that get bought out by giant brands that then take the innovation to scale. Large organisations, at their worst can repel disruptive innovation as they have too much invested in the current paradigm – they protect the status quo. Aware of this they often seek and acquire new entrants with disruptive technologies and seek to absorb them in the current paradigm and incrementally change their business.30

In public services, this relationship is often between small-scale. front-line delivery organisations like job centres, libraries, or homecare providers and large-scale commissioning organisations such as local councils, primary care trusts or central Government. There are relatively weak relationships between most commissioners of services and most small-scale innovative providers – especially those from the third sector or independent sector. The Innovation Exchange (www.innovation-exchange.org) is a good example of an intermediary set up to broker relationships of this sort.

The second relationship is between 'innovation creators' and potential investors. Selling innovations to a larger, delivery-orientated organisation is not the only way of going to scale. Growing the organisation that generated the innovation in the first place is also a possibility – requiring more often than not financial investment from elsewhere, as well as business support.

Capital investment in innovation is not common in public services, but it does occur. Most public services do not enable investors to make a financial return on their investment, so the major capital investors have been philanthropists, charitable trusts and foundations that have sought a social return rather than a financial return on their investments.

There have been experiments in public services where investors have been able to make a financial return on investment – the private finance initiative being the most well known. Futurebuilders is another that provides loan capital to third sector innovators in public services. New Philanthropy Capital is an example of a broker and innovation consultancy that advises investors (philanthropists) on which sectors and which socially-innovative organisations to invest in.

Intermediaries broker relationships among networks of innovators.

Despite popular myth, innovation is a collaborative and social process that feeds on relationships between diverse groups of people.

Intermediaries support social networks of innovators who may collaborate on some things and compete on others, but all benefit from the random connections they make, the exposure to ideas, and the access to unfamiliar knowledge. Futurelab is a good example of an intermediary organisation in the education and technology sectors that operates by bringing together innovators from a range of different organisations to support, challenge and inspire one another.

Finally, innovation intermediaries in public services also broker relationships between policy makers and practitioner innovators. The purpose of brokering these relationships is to create new ideas for policy, and to create better conditions for an innovation to develop and grow in practice. Relationships between policy makers and innovators are extremely difficult to foster given the nature of modern bureaucracies, the careers of civil servants, the short tenure of ministers, and the insularity of large

parts of Whitehall. Some parts of Government have tried hard to break this culture within the bureaucracy and become more permeable to innovative practice on the ground, examples include the Social Exclusion Taskforce, the Office for Disability Issues, the Prime Minister's Strategy Unit (PMSU), and the Child Poverty Unit. Commonly though policy makers and practitioner-innovators struggle to talk to one another, using different professional languages and bringing such different perspectives. Brokers help to translate and interpret between these different communities.

Policy makers can be very influential in the success of an innovation in public services as they can make changes to the organisational structures in the system, the way funding is allocated, the forms of regulation and performance management and the way organisations are held accountable. They also have an important leadership role. They can inspire, challenge and encourage others with the messages that they communicate. In theory they are able to create permission and license

innovators to take risks in a culture, which is necessarily risk averse both with public money and with public outcomes, like a person's health, a child's education or a citizen's safety. In practice, Government finds this role difficult.

These innovation intermediaries are trying to change cultures within public services by changing the way different parts of the public sector relate to one another and the way the public sector relates to the wider world – to business, academia. the third sector. They are trying to challenge cultural assumptions about the sources of change in public services and the nature of innovation. In education they are challenging the notion that innovation is generated by central Government and imposed on a reluctant profession. They are also challenging the notion that innovation will come naturally if practitioners are 'left alone to teach', pressures of accountability are reduced, and schools and headteachers have more freedom and space to be creative.

What services do innovation intermediaries provide?

Most of the innovation intermediaries working in public services provide different services and use different methods and methodologies to support the organisations with which they work. Bessant provides us with a useful taxonomy of management capabilities that intermediaries provide the organisations they work with.³¹

Expert consulting – they provide solutions to the particular innovation problems that their clients have.

There is a wide range of design-led innovation brokers such as IDEO,
Livework and Engine who bring expertise and skill in innovation processes that start from the perspective of the individual customer and help organisations rethink what they do.

Experience sharing – they transfer knowledge and learning from

different organisations, sharing the lesson of innovations that have succeeded and failed elsewhere There is an explicit role for intermediaries to help organisations look around the world and research the way others have tackled similar problems. Organisations like schools, job centres, local councils, and social housing providers that are dominated by local operational and delivery issues often lack the capacity to engage in research or access the research community. Think-tanks, like Demos, work with leaders in public services enabling them to access research in useful and usable formats and create 'spaces to think' and play with new ideas in creative ways – they operate as 'ideas' factories'.

Brokering – they try to match potential partners who could best develop and spread an innovation by working together. The Young Foundation and its various programmes is an excellent example of an organisation that incubates innovation projects by trying to create the right partnerships for innovative ideas to grow.

Diagnosis and problem definition – they help organisations understand and define their needs for innovation.

The Social Innovation Lab for Kent (SILK) is a good example of a local innovation catalyst that invests significant time and resource into the process of problem definition and redefinition, involving both the public and professionals in the process. They have used ethnographic techniques to good effect in attempts to get a different perspective on the problem.

Benchmarking – they help organisations to identify and engage with leading practice in other organisations, sectors and countries. The Young Foundation is strong in this area, with its focus on action research and its significant research capacity. NESTA probably has made the biggest contribution in this area, focusing as it does on researching the innovation challenge in different sectors and designing programmes to meet those sector-specific challenges, and developing ways of assessing and measuring the impact of different innovations and innovation processes. Change agency – they provide coaching, consultancy and training to organisations running innovation projects. The Innovation Unit's Next Practice methodology provides a high level of this kind of support, mainly within children's services.

We might add to this list the following three capabilities that apply to intermediaries working with public service organisations:

- I. Influencing policy is a role that public service intermediaries play that is clearly missing from Bessant's taxonomy. The Young Foundation is one of the most influential intermediaries with Government across a wide range of policy areas.
- 2. An advocate for the public

 unlike in commercial
 environments, innovation
 intermediaries in public services
 are often advocates for customers
 and service users, helping their
 voice be heard in the innovation
 process. This is necessary because
 taxpayers rather than customers
 fund most public services. They

have dual accountability upwards to the organisation that funds them and downwards to the public that they serve. The voice of the service user can often get lost in discussions about how to do things differently. The NHS Institute has developed an excellent experience-based design toolkit that helps innovators in the NHS understand the experiences and perspectives of the public. SILK has also developed a 'person-centred' framework, designed to help local councils do the same.

3. Providing a methodology and methods – innovation intermediaries often develop a methodology for innovation, which explains how innovation occurs and provides tools and processes that can be used in different settings. There is a large number of design organisations that have a highly developed innovation methodology routed in the discipline of design.

Examples include IDEO, Live Work, Engine, Think Public and Participle. Their work has generated a wealth of methods that can be used to support innovation in public services. The Design Council also has a history of applying design methodology to public services and its RED team and its flagship programme, Dott 07, has done much to introduce design-led innovation intermediaries to public service problems.

What can we learn from research about innovation?

Our understanding of how innovation happens has changed dramatically over the last 30 years. We have learnt that innovation does not come from lone inventors in their laboratory dreaming up completely original ideas, but from networks of innovators collaborating and recombining old ideas from diverse sources to create new ideas.^{32,33}

Innovation-rich sectors tend to be highly networked, with a high number of random connections between individuals and organisations and a high level of social, cultural and professional diversity within these social networks. This model of distributed innovation explains the important role that brokers play in establishing and maintaining such networks and relationships, especially in sectors where these relationships do not form easily.34 Building relationships between innovators in different organisations and creating rules that make it safe to share, be open about problems and potential solutions is important.

Brilliant invention does not automatically lead to innovation. Many original inventors fail to take their invention to market, where subsequently others succeed. Hoover did not invent the vacuum cleaner and Singer did not invent the sewing machine, but they were infinitely more successful than the original inventors at taking these new products to a mass market. Creating

relationships between original inventors and those who understand how to take new ideas to scale is key.³⁵

Finally, we have learnt that many radical innovations in products and services involve the users of those products and services in a deep way. Von Hippel records how users have generated many of the more radical innovations that have been adopted by manufacturers in very successful ways, and indeed many innovations that did not require a manufacturer to adopt them in order for them to spread – such as credit unions. This understanding of innovation as an open and distributed process requires a strong network of relationships involving many different players, including service users – and explains in part why innovation brokers in public services become strong advocates for user participation.³⁶

These research findings suggest that there is an important role for intermediary organisations in supporting innovation – and none more so than in public services. Most recent studies of innovation in public

services recommend intermediaries as part of the infrastructure for supporting innovation at scale.³⁷ Experience has demonstrated their value in other sectors of the economy – especially in science and technology where Government has been most active in promoting their role and spent most money on evaluating their impact.³⁸

How can
Government create
an innovation
infrastructure in
public services that
uses intermediaries
to good effect?

The Department for Innovation, Universities and Skills (DIUS) published Innovation Nation in March 2008 with high ambitions: 'We set out our aim to make Britain the best country in the world to run an innovative business or public service.'

The chapter on public sector innovation highlights the imperative of innovation in education, health

and transport. It outlines how Government has committed to spending over £2.5bn on innovation in public services from projects like the Transport Innovation Fund worth £600m, the Social Care Reform grant of £518m to Local Authorities or the £60m for the Health Innovation Council.

The White Paper announced plans to establish a Whitehall Innovation Hub, a network of Whitehall innovators and an Annual Innovation Report, which could increase the permeability of central Government to innovation 'at the frontline' as it is sometimes known. However, these initiatives risk reinforcing the belief that innovation comes from Whitehall, or that Whitehall should find innovation and impose it on everyone else.

The White Paper also announced a study into the risk-averse culture of the public sector by The National Audit Office (one of the organisations arguably most responsible for creating that culture). It suggested exploring the extension of the Power to Innovate legislation, which

exists currently only in education, and the development of a training programme for managers of public services, designed to increase demand for design-led innovation. This programme has been developed by the Design Council and is based on their successful model for the private sector.

Finally, and most promisingly, Innovation Nation announced the creation of a Public Services Innovation Laboratory, run by NESTA in partnership with many existing innovation intermediaries such as the Young Foundation, The Innovation Unit, Improvement and Development Agency for local government (IDeA), The Design Council and the Innovation Exchange. The Laboratory will trial new methods of supporting innovation, search for innovation in public services around the world, disseminate lessons to delivery organisations, develop training, tools and services for practitioners and influence policy. This is a real opportunity to invest in the innovation infrastructure for public

services. However, the Laboratory could take different forms.

The Laboratory could also become an expanded Challenge programme, NESTA's current innovation programme focusing on health, mental health and climate change. Alternatively it could be focused on locations rather than sectors The best model of this approach is probably Dott 07, run by the Design Council and One North East, which ran design-led innovation projects in the north-east of England where design-led innovation agencies were commissioned to work with local people to tackle a diverse range of social problems such as teenage sexual health, Alzheimer's, low carbon housing and public transport in rural areas.

The Laboratory could become a service provider to other innovation intermediaries, helping them to build capacity, educate demand, build a business case and business model, and create an evidence base for what works in social innovation – evaluating different methodologies

for supporting innovation. In emerging fragmented markets like this, nurture and support are needed alongside financial incentives.

Finally, the Laboratory could become 'a system influencer' campaigning for changes in policy, publishing research and leading a debate about how to really make Britain the best country in the world to run an innovative public service.

Recommendations

We recommend that Government seeks to create propitious market conditions for innovation intermediaries working in public services. It should attempt to stimulate demand for innovation brokers by regularly communicating the innovation imperative, regulating sectors in ways that encourage innovation, use public money to leverage more investment, and encourage leaders to grow the capacity within their organisations to work firstly with intermediary organisations and more importantly to manage the brokered relationships with other innovators, universities, policy makers, investors and businesses necessary for innovation to flourish 39

Government should also attempt to support the emerging field of innovation intermediaries in a similar way to that through which it has supported intermediaries in science and technology sectors. One example of Government working to grow capacity for intermediary organisations is the EU initiative to establish Innovation Relay Centres to facilitate the transfer of innovative technologies to and from European companies or research departments.⁴⁰

We have argued that the emerging market of innovation intermediaries working in public services is a fragile, underdeveloped market of SMEs that could be damaged by policy making which is unintentionally unhelpful. Competition and collaboration are to be encouraged in the sector, while bureaucracy, monopoly, risk aversion and high barriers to entry must be avoided.

Government usually finds demandside approaches much more difficult than intervening on the supply side, however, of all places, innovation policy must break this mould. After decades of supply-side reforms focused on organisational structures and ways of regulating the practice of professionals, the next era of innovation in public services needs to focus on the participation of service users themselves in the innovation process if we are to see the radical changes necessary. Particular changes would include:

- » increased levels of choice for the public; not just between providers but between services and experiences offered by each provider
- service users having greater control over how money is spent through the use of personal budgets in some specialist and targeted services and through participative budgeting in universal services
- » increased voice for service users through participation in decisionmaking, more democratic organisations and better dialogue between professionals and the public
- increased investment in services that promote self-reliance, personal responsibility and independence for citizens supporting and sometimes challenging people to do what they are best placed to do manage their own lives without being dependent on public services

Government has accepted the importance of allowing new entrants to disrupt patterns of provision that are ineffective or poor value for money. However, actually shifting resources away from old providers to new is much harder in practice. Decommissioning services is much harder than commissioning new ones. DIUS should influence policy in other Government departments to ensure that commissioning public services actively promotes innovation.

Government also needs to increase the access to financial capital for new entrants in to public services which are so often the source of innovation. The development of loan capital, share capital and venture capital in public services is beginning but is still very small. Major changes are needed to funding mechanisms if investors are to receive financial returns on their investment Innocentive.com is an interesting model offering financial returns to innovators that could be applicable to public services. However, in many areas a financial return will not be

politically acceptable, in which case a social return on investment must be offered. Government should develop and implement a common approach across departments to measuring the social return on investment in public services, and encourage other social investors such as philanthropists and corporations to adopt it.

Final thoughts ...

The kind of innovation in public services that radically transforms outcomes for people on a large scale does not come from letting 1,000 flowers bloom as we have seen in education. Experimentation without discipline does not lead to innovation at scale. Neither does such innovation come from monopolies or bureaucracies who search for innovations and then impose them on others. Centralised approaches can damage the capacity of the system to generate more innovations in the future.

Such innovation at scale comes from decentralised systems where there is a rich multitude of connections and relationships between a diverse range of people and organisations. The power of random connections and the opportunity to combine ideas and knowledge from unrelated and distant areas is fundamental to the process of innovation. Innovation brokers provide an infrastructure to support such relationships.

Such innovation also comes from systems where there are strong organisational incentives, financial or otherwise, to develop innovations, reveal innovations to others and to absorb such innovation into the way an organisation works. Such systems need organisations that are hungry in their pursuit of innovative ideas from elsewhere. Such systems also need clear and shared outcomes and ways of measuring them that are capable of evolving over time. Innovation is greatly hampered by measuring what is possible in the future, with instruments that measured what was important in the past.

Finally, social innovation at scale comes from systems that give the public tools to innovate for themselves.⁴¹ Brokering this transition is what many innovation intermediaries in social innovation are passionately committed to.

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- 1 We use the term 'innovation broker' and 'innovation intermediary' interchangeably throughout the text. Intermediary is commonly used in technical and policy documents but sounds a little passive a mere go-between. Broker is a more active term indicating a role that connects people but also generates and facilitates innovation. We have avoided other terms such as innovation facilitator or innovation catalyst, which although accurate add new terminology to an area already full of jargon.
- 2 We use a working definition of innovation brokers and innovation intermediaries from Henry Chesborough: "innovation intermediaries, or firms that help companies of many different sizes participate in the emerging secondary markets for innovation and IP and craft more open business models." Chesbrough, H (2006) Innovation Intermediaries, enabling open innovation, HBSP, Boston, Mass. The open business model indicates that the brokers are not trying to monopolise and gain commercial advantage from the innovation itself, but rather to make the innovation more widely available and accessible so that it is used at scale
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The Innovation Unit

The Innovation Unit works as an innovation intermediary in public services. It is devoted to stimulating, incubating and accelerating innovation to achieve transformed services with better outcomes for citizens. We believe passionately that the creativity of public service practitioners, working collaboratively with service users, holds the key to this transformation. We support the process by bringing evidence-

informed disciplined methods to innovation.

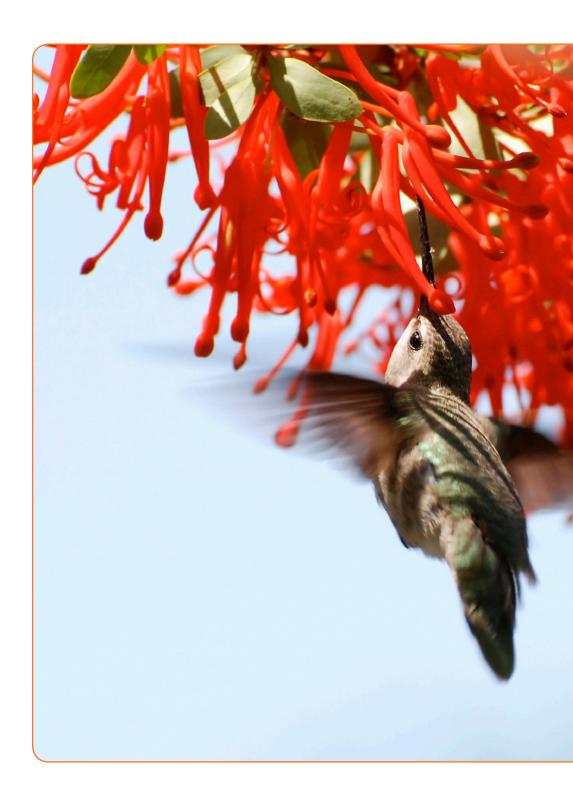
Major strands of work include the Next Practice Education Programme in schools and children's services; and the Innovation Exchange for the Third Sector.

To find out more about our work, please visit our website:

www.innovation-unit.co.uk

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Where is the Silicon Valley for public services in Britain?

Highly innovative sectors of the economy benefit from an infrastructure of science and innovation parks, business incubators, R&D labs and the like. What would the equivalent infrastructure look like to support innovation that tackled chronic disease, youth crime, climate change or teenage pregnancy?

This booklet explores the role of innovation brokers in public services. It looks at what they are, what they do, and why they might be needed to support innovation in public services. In particular, it looks at how they broker knowledge and relationships between innovators with ideas, managers and commissioners looking for solutions, investors and policy makers.

The emerging market of innovation brokers working in public services is a fragile underdeveloped market of SMEs that could be damaged by unhelpful policy making. We recommend that Government seeks to create propitious market conditions for innovation intermediaries working in public services – just as it has encouraged innovation intermediaries in hi-tec, high innovation commercial sectors

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You can download this publication from The Innovation Unit's website: www.innovation-unit.co.uk.

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