

# CREATING SUSTAINABLE FRAMEWORKS FOR SERVICE REDESIGN AT PRACTICE LEVEL IN THE NHS

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## ABSTRACT

The National Health Service (NHS) in England is pursuing a programme of transformation through innovation, aiming to ‘provide High Quality Care for All in an NHS fit for 21st century and beyond’. Practice Based Commissioning (PBC) is one key strategy, devolving responsibility for commissioning of health services from Primary Care Trusts (PCTs) to front-line clinicians in General Practice (GPs). Focusing on developments in the North West Strategic Health Authority (NW SHA), this paper discusses the means by which varying structures of PBC governance afford scope and support for sustainable innovation at practice level.

Preliminary results from a project with one large GP practice in NW SHA investigating the application of design methods to issues of patient engagement and the redesign of care pathways are discussed, as is the necessity of reinterpreting and adapting these tools to ensure that clinicians and practice managers can appropriate and apply them in daily practice.

## KEYWORDS

Innovation, NHS, Primary Care, Service Design, Sustainability

## 1. BACKGROUND

### *1.1. Developments in the NHS*

The NHS was established in the UK in 1948 as a means of providing universal access to medical services based on clinical need, not ability to pay. This social healthcare system is widely utilised and supported in the UK and less than 8% of the population choose supplementary private healthcare provision. Buildings and infrastructure development are perceived to have been the main focus of the NHS for the first 40 years of its existence ((Bradbeer, 1954; Guillebaud, 1956; The Bristol Royal Infirmary Inquiry 2001) with the NHS Plan (Department of Health (DoH) 2000) and later reports changing the focus to placing primary care at the heart of health promotion initiatives (Wanless, 2004), reducing the reliance on secondary and acute care, and ‘bringing care closer to home’ (DoH 2006, 2008).

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Changing demographics have shaped these policy changes, with an ageing population portending a diminishing tax-paying workforce, supporting an increasing number of chronically ill older people, forcing the NHS to ‘do more with less’ (HayGroup 2008; Audit Commission 2009). Attempts to balance issues of economic efficiency (such as limited capacity and restricted budgets) with social concerns for equity have led to questions about the effectiveness of current mechanisms for the delivery of healthcare services. An integrated health and social care system which will provide a framework for supporting people in managing their own health is seen as a key component in achieving both the economic and ethical imperatives (DoH 2009; HM Treasury 2010) and is the basis of the World Class Commissioning strategy for improving health outcomes (DoH 2007).

The Department of Health has recognised that patient involvement is not solely based on consumerist approaches to the healthcare market, a perspective introduced in the 1980s (Klein 2006), but that the public has articulated an increased willingness and capacity to be involved in decisions about their healthcare (DoH 2007). This parallels developments in other public services which emphasise a ‘duty to involve’ the public in decisions regarding service redevelopment (HM Government 2007). One of the main objectives of current health services reform, according to Lord Darzi is:

‘An NHS that gives patients and the public more information and choice, works in partnership and has quality of care at its heart’ (DoH 2008).

In England, increasing public expectations have driven a focus on the quality of healthcare services which has led to the tightening of regulations and standards through the Care Quality Commission and Quality Framework initiatives such as Indicators for Quality Improvement, the National Quality Board and the Commissioning for Quality and Innovation (CQUIN) and Patient Reported Outcomes Measures (PROMS) payment frameworks. Staff have, likewise, been subject to quality based contracts (Quality and Outcomes Framework, QOF), in primary care.

The next few sections will examine the concept, definitions and applications of sustainability in four domains with relation to the NHS. Subsequent sections will examine how organisational change and primary care initiatives such as PBC contribute to the sustainability of current healthcare frameworks. Finally, a discussion of the Design in Practice project will consider how design tools might contribute to innovation in healthcare service redesign.

## ***1.2 Sustainability in the context of NHS***

Sustainability is a concept which is generally defined in four domains: human, social, economic and environmental. It is suggested that sustainability involves working within the regenerative, assimilative and adaptive capacities of a system (Goodland 2002; Folke et al 2002), managing consequences of excessive consumption of non-renewable resources, while safeguarding the capacity of renewable resources. In terms of the NHS it is recognized that there are finite budgets for healthcare, that the assimilative capacity of the system faces pressure from increased demands associated with the ageing population and obesity-related health problems, and that the regenerative capability and resilience of the service has been severely depleted as decades of restructuring have left a disillusioned workforce suffering from low morale and lack of motivation (Sullivan 1993; Laschinger and Havens 1997; Avallone and Gibbon 1998; Woodward et al 1999; Shannon et al 2001; Kluska et al 2004).

In the next section we examine how the NHS in England is addressing the issue of sustainability across the four domains outlined above.

### **1.2.1 Human**

Human capital refers to preservation of individual health and wellbeing – the very essence and purpose of the National Health Service, a philosophy which has been rediscovered in the last decade. Antonovsky (1996) rejected the emphasis of the pathogenic model, focusing on sickness and disease and suggested a revised salutogenic model, highlighting the importance of maintaining health and wellbeing. Wanless, in his report of 2004, agrees, suggesting that the NHS ‘will need to shift its focus from a national sickness service, which treats disease, to a national health service which focuses on preventing it’. Further, in attempting to predict future demands on the NHS, he produced three scenarios of ‘fully engaged’, ‘solid progress’ and ‘slow uptake’, each related to how individuals might take responsibility for maintaining their own health.

### **1.2.2 Social**

Goodland (2002) suggests that social capital is comprised of

‘investments and services that create the basic framework for society. It lowers the cost of working together and facilitates cooperation... only systematic community participation and strong civil society, including government, can achieve this.’ (p.2)

He continues by suggesting that western-style capitalism, with its focus on competition and individualism, can undermine social capital diminishing the shared value of community. Reich (2002) posits that the ‘marketization’, promoted in the 1980s as a solution to the inefficiency of centralized public

services, reflected this shift away from a public interest perspective, esteeming the value of choice over cooperation. Wilkinson (1996) and Coburn (2000) found that neo-liberal, market oriented forms of government, where the welfare state is undermined, lead to higher income inequality, social fragmentation and lower average health status and life expectancy.

Since the Black report of 1980, and, more recently, with the focus on equitable access to healthcare in Lord Darzi's report (DoH 2008), government initiatives have focused on the social determinants of health, with specific programmes addressing health inequalities (Wanless 2004; DoH 2008c; Royal College of General Practitioners 2008; European Union 2008; Marmot 2010).

### **1.2.3 Economic**

Economic sustainability is a function of the efficiency and effectiveness of business management (Found et al 2006). Hicks (1940) and Kuznets (1948), in examining the concept of social income as an index of welfare, defined economic sustainability as a balance of current levels of economic consumption with the viability of remaining economic resources.

It is generally accepted that funding for the NHS cannot be sustained at historic levels. Under the current Labour government spending on healthcare has more than doubled (DoH 2009c). A review of developments in health promotion efforts, focusing on patient engagement in their own healthcare has led Wanless, Appleby, Harrison and Patel (2007) to conclude that current progress lies somewhere between solid progress and slow uptake, suggesting a continuing increase in demand on the health services.

Addressing the lack of balance between demand and supply capacity in public services, a new model 'Open Welfare' has been proposed by Cottam and Leadbeater (2004). In addition to providing the opportunity to stretch the productivity of existing organisations, this model relies on mass participation in the design and delivery of services, reconfiguring the system and introducing new innovation actors.

Given a freeze, or, at the least, restricted increases in funding, and simultaneous increase in demand as a result of changing demographics, Appleby, Crawford and Emerson (2009) have predicted a shortfall of between £20-30 billion in NHS funding by 2017. Wood (2009) and Haygroup (2008), both suggest productivity gains as the only acceptable answer to funding problems in NHS, but warn that staff engagement will be the main hurdle in implementing any efficiency drives.

Two potential areas which may lead to productivity gains in the NHS have been identified as shifting more care from acute to community settings, and better

integration of health and social care services. Practice Based Commissioning (PBC) has been proposed as a suitable channel for the introduction of these changes (DoH 2007).

### 1.2.4 Environmental

Environmental sustainability focuses on the protection of natural capital, and maintenance of ecosystems. Energy efficiency in healthcare facilities has been the main focus of Department of Health guidance in recent years, with the need for energy and carbon management policies being emphasised at all levels (DoH Estates and Facilities Division 2006; DoH 2005). The Building Research Establishment's Environmental Assessment Method (BREEAM) assessment tool for measuring the environmental impact of buildings has been adopted as the standard for refurbishment and new builds. The renewed focus on localised and community care, reducing travel, has also been supported with the development of 'hub and spoke' models of polyclinics, again retaining the majority of health services within local community settings (Johnson 2007).

Concluding this section on sustainability in relation to the NHS an illustration by Hancock (1993), drawing from Barbier (1987), explains that human health, the first domain of sustainability, is a product of the dynamic functioning of the interrelation of the three other domains as indicated below.

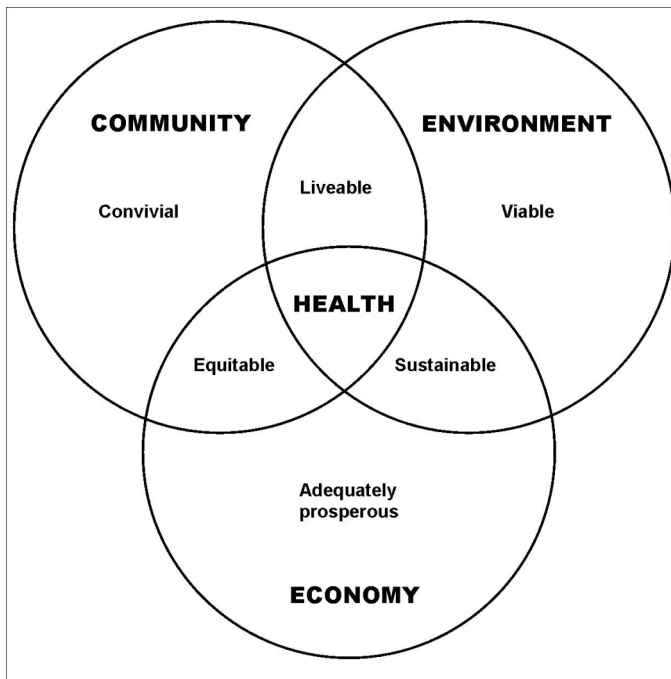


Fig. 1. A model of health and the community ecosystem (from Hancock, 1993)

### ***1.3 Organisational change in NHS***

How can the NHS improve productivity, increasing efficiency and effectiveness, whilst maintaining its focus on equitable access to and ethical delivery of healthcare services?

As the largest organisations in the UK, and one of the largest employers in the world, the NHS has been accused of promulgating vicious circles of bureaucracy (Crozier 1964; Masuch 1985; telegraph.co.uk 2010; BBC News Channel 2009) with too many changes layered one upon the other, often with seemingly conflicting targets. This continuous ‘top-down’ change in the NHS has led to the disengagement, cynicism and even hostility of staff in the service - what Oxman, Sackett et al (2005) have described as the cumulative negative effect of ‘redisorganization’ at all levels. The complexity of the organisation with its nested structures and processes, functional and disciplinary boundaries and hierarchies which are compartmentalised, yet highly interdependent and strongly coupled, makes any efforts at organisational change challenging (Van De Ven and Poole 1995; Litaker et al 2006). Organisational Development (OD) experts have distinguished between first-order change, representing incremental changes within an organisation without fundamental system change, and second-order change, where the core values and schemata of an organisation are challenged and redeveloped (Watzlawick et al 1974; Bartunek and Moch 1987). Within the NHS the drive towards rewarding quality instead of volume, as detailed below, is seen as an attempt at second order change (DoH 2000; Johnson 2007; The King’s Fund 2010).

Since the government introduced the purchaser/provider split in the health service in 1991 the issue of purchasing or ‘commissioning’ healthcare services has continued to provoke debate and controversy, with a recent report suggesting that the transaction and management costs associated with this approach are now approaching 14% of the total health budget for England - around £14 billion (Health Committee 2010). While Scotland and Wales have now reverted to an integrated health service, England has, so far, continued to try to balance power and responsibility between Hospital/Foundation Trusts and Primary Care Trusts (Smith, Curry, Mays and Dixon 2010). Recognising the relative weakness of the commissioning skills in the PCTs, World Class Commissioning (WCC) was introduced in 2007, providing an accountability and development framework, outlining core competencies to be developed in PCTs, and identifying 11 strategic outcomes on which the PCTs would be assessed (Woodin and Wade 2007). As a means of counteracting the activity based payment system associated with Payment by Results (PbR), CQUIN, PROMS, and Quality Accounts have all been developed to allow PCTs leverage in terms of a quality focus in

commissioning. Responsibility for commissioning streamlined and *innovative* care pathways to achieve the 18 week target for patient referral (DoH 2006b), shifting the emphasis from diagnosis and treatment to prevention and promotion of wellbeing through a multi-sectoral approach, developing open and *innovative* partnerships with the public, other public service agencies and the voluntary sector are some of the key themes related to achievement of WCC status (DoH 2007a).

At practice level, the Quality and Outcomes Framework (QOF), developed in conjunction with the Royal College of GPs, has four domains of measurement based on clinical standards, organisational standards, additional services and patient experience, against which practices are assessed and reimbursed. These have generally been accepted well by GPs although the associated burden of bureaucracy has placed heavy demands, especially on smaller practices (McDonald, Checkland and Harrison 2009).

A focus on ‘innovation’ as a key route to improvement is evident in many of the Department of Health publications, and is the remit of the NHS Institute for Innovation and Improvement (NHSi), who have promoted the application of ‘design thinking’ and ‘design science’ as methods of enabling creative approaches to both defining and solving Organisational Development problems in NHS (Bevan, Robert, Bate and Maher 2007). Swan, Newell, Scarbrough and Hislop (1999), in examining the constituents of an innovative environment, have identified the importance of the social and organisational context in facilitating or hindering innovation. Fragmentation and fixed departmental and disciplinary boundaries create barriers to innovation, while communities of practice and boundary spanning activities, - what Swan and colleagues call ‘heedful interrelating’ are key to knowledge exchange. The federated models of GP practice, advocated by the Royal College of General Practitioners (2007), and, indeed, the consortia and federated models of Practice Based Commissioning, both have the potential to act as creative networks in the environment they provide for cross-functional, inter-organisational, and interdisciplinary interactions.

The following sections present findings from an 18 months research project called “Design in Practice: Change and Flexibility with Healthcare Providers”. The project, funded through the HaCIRIC network, involves a research team from Lancaster University, in collaboration with Salford University, in exploring the modes through which PBC has been implemented in England, while questioning if and how design and other creative methods and skills might support clinicians in service redesign activities, both at practice and PBC level. The team has carried out extensive desk research into NHS reform and the PBC

framework with in-depth case studies on three PBC groups in the North West Strategic Health Area (NW SHA), and specific design workshop interventions with one large GP practice.

## **2. PRACTICE-BASED COMMISSIONING IN NW SHA**

### ***2.1 Background to PBC***

Practice Based Commissioning (PBC) is one of the strategic frameworks responsible for implementing key elements of the NHS Plan (2000), devolving responsibility for the commissioning of healthcare services to frontline clinicians. The rationale behind this development is that clinicians in general practice have the closest contact with the public and will be able to commission appropriate, tailored, locally based services, improving effectiveness, efficiency and equity. Community based services are also seen as more sustainable in terms of building social capital, and limiting use of environmental resources. Economic sustainability will also be improved as commissioners review services, specify improvements and hold service providers to account for the services they deliver (The King's Fund 2010). The Audit Commission (2007, p.2) suggest that,

“by devolving indicative budgets to practices that treat and refer patients, GPs and other primary care professionals are being encouraged to manage referrals and to commission and redesign services in a way that is more cost-effective and convenient for patients.”

PCTs are expected to provide both business and financial support to enable GPs to form PBC networks, within which they can examine patient care pathways, using their knowledge of specific local health problems, and produce proposals for the redesign of healthcare services in line with PCT strategic health plans. The PBC networks, at the present time, hold only ‘virtual’ budgets with the PCT approving business plans, but, as an incentive, the consortia are allowed to ‘keep’ or reinvest up to 70% of ‘Freed Up Resources’ (FUR) of efficiency gains from improved service pathways. The rationale behind this framework is that clinicians can challenge entrenched approaches to the provision of healthcare services, and reshape the boundaries between primary and secondary care, with an emphasis on bringing care closer to home and reducing overheads. Introducing the concept of PBC, Department of Health guidance (2004, 2006c) suggested that, ‘the freedoms and flexibility of Practice Based Commissioning give front line professionals and managers the information, levers and incentives to improve services in response to the needs of their patients and local populations. It will facilitate clinical engagement, improve access and extend choice for patients and help restore and maintain financial balance.’



In reality, although PBC has been functioning since 2004, in many areas it has progressed slowly, with problems associated with lack of trust and suspicion between primary care clinicians, hospital consultants and managers, and PCTs; uncertainty over the particular responsibilities of PCTs and PBC groups; and lack of (and conflicting) data from secondary care and PCTs delaying effective functioning of PBC and preparation of service redesign proposals (Audit Commission 2007; Department of Health 2009a; Health Committee 2010). These problems are intensified by clinicians' lack of service design skills and time and capacity to develop these. In some areas PBC networks are beginning to adopt federated models of practice, with a significant minority forming social enterprises, some also developing separate 'provider' enterprises, allowing them to take control of both the commissioning and provision of healthcare services in their area. While these more structured models have resulted in the faster implementation of new service models of care, there is concern that they may suffer from a lack of local focus, negating the intention to bring care decisions closer to the local community.

The following section outlines some insights into PBC frameworks as they have developed in North West of England, illustrating the diversity of models of governance, support and collaboration. These insights have been developed through the case studies in each area, involving a series of interviews and mapping exercises with each consortia.

## ***2.2 PBC Consortium A***

Consortium A is often presented as a 'best practice' example of how early uptake of PBC has led to innovation in both commissioning and the provision of improved services. Consortium A has been driven by two visionary people, a clinician and an executive director of the PCT, who together encouraged all of the 53 GP practices in the local PCT area to form one large commissioning group, giving greater influence and reducing the governance structures which might have proliferated with smaller PBC groups. Engagement exercises were facilitated by the PCT, which adopted a 'top down' approach to PBC implementation. Once formed, the PBC group elected to become an Industrial Provident Society, managing the whole PBC framework, and Charitable Company A (CCA), was formed in April 2007 with up to 45 staff from the PCT being seconded to CCA as business support. As such CCA have direct responsibility for almost all of the commissioning of health services within the PCT, managing a budget of £299 million for GPs with a patient base of 295,000 annually. Members of the society have developed a wide range of incentives and support structures for GP practices in the group, such as enhanced pension schemes, risk management and insurance, and even IT contracts. Membership of the Society is based on proportional representation from GP practices. An additional Community Health Enterprise is a GP owned subsidiary company of

CCA, acting as the provider arm, managing the provision of estates. They are a national demonstrator site for the government Community Hospital initiative and will act as project managers for a new purpose built diagnostic and treatment centre in the area. One of the lead GPs clearly believes that PBC has improved patient care in the area, stating that, “[PBC is about] making health and social care for patients safer, faster, and more accessible, whilst making it more evidence based and cost effective for PCTs”

The strong structure of this large PBC group has allowed it to employ the expertise of dedicated business, finance and data managers. Effective data interrogation, in particular, has allowed CCA to identify care and spending anomalies, and redesign and re-specify some clinical care pathways to bring them into line with the best of national comparators. However, in a recent national survey of PBC leads, one of the representatives from Consortium A indicated that the PCT still had to increase the resources available to clinicians in General Practice to recognize problems of workload associated with involvement in PBC, and allow practices to re-shape to commit additional effort to PBC work-streams (DoH 2009a).

### ***2.3 PBC Consortia B***

Consortia B PCT has six PBC groups with a patient list of around 50-65,000 for each group. The consortium self-formed around historical relationships and geographical boundaries. Activity of the PBC groups had been limited to some very small scale, local service changes with limited impact. In 2008 the PCT appointed an external consultant, procured through the DoH Framework for External Support for Commissioners (FESC) programme, who acted as a catalyst for revitalising the PBC process. According to the PBC business manager and one of the GP leads, the FESC partner ‘brought an enormous amount of energy’ to the PBC process, along with knowledge about what PBC was meant to do and deliver, and understanding of relevant structures and systems, policies and processes, areas of expertise lacking in both the PCT and clinicians (personal interview, March 2010). With the appointment of a FESC consultant to each PBC consortia, the PCT also provided a network group comprising a defined commissioning manager, commissioning assistant director of support (relationship manager), public health support, finance, data and medicines management support. These are fully funded by the PCT as part of their support package for PBC. Each of the PBC groups was given targets by the PCT beginning with developing the structure of the group, addressing health inequalities in their localities, examining demand and medicines management and taking responsibility for proactive management of the PBC budget, followed by the development of two service redesign proposals based on the PCT’s strategic priorities.

A detailed Service Design Methodology, produced by the FESC partner, outlined a series of steps to bring focus to clinical panel meetings attempting to develop service redesign proposals, allowing the consortia to progress some large scale service redesign proposals (such as redesign of the stroke care pathway) to the Commissioning Advisory Board (CAB). A process mapping exercise with one of the business managers and GP leads, identified some issues related to poor data and concurrent PCT re-structuring as having created some obstacles in the redesign process, but also highlighted the strengths of this particular clinical panel (stroke care) in involving a wide group of stakeholders from patients and carers, through hospital staff and managers to local council and social services, in the service redesign process.

The GP lead for this consortium, explained that going through the service redesign process has opened GPs' eyes to how poorly services had previously been specified, with consultants being left to determine how services were provided, with little influence from the PCT as commissioners responsible for paying for the services. He suggested that, now that clinicians in primary care have gained understanding of the processes involved in commissioning, they will no longer be willing to accept whatever the acute sector chooses to provide (personal interview March 2010).

#### ***2.4 PBC Consortia C***

There are three PBC groups within Consortia C, each covering distinct geographical areas. The largest group operates a system where each practice is given one seat on the consortia board, however this is not allocated proportionally so, for example, a practice with a patient population of 32,000 has one seat, the same as small single-handed practices with populations of less than 5,000. This necessitates diplomatic negotiation between practice representatives to identify priority areas, common to the group, to focus their efforts for service improvement. The other PBC group interviewed involves 22 smaller practices, representing 158,000 patients. Both of these PBC groups have employed business managers independent of the PCT, using their own funds, and do not have the services of any dedicated staff within the PCT. However, in line with PCT strategic priorities (developed jointly with the PBC groups), and recognised areas of service inadequacy and inefficiency, the consortia has set up steering groups with lead GPs investigating particular areas, and developing service options.

The business managers of both PBC consortia have indicated that lack of information from the PCT to enable the formation of accurate business plans, lack of a realistic budget and up-to-date reports on PBC activity and savings generated, have constituted major hindrances to further development of the PBC Consortia Activities, as have conflicting data from secondary care providers. A process mapping exercise with the second PBC group indicated the range of

difficulties and frustrations the group had encountered in attempting to redesign dermatology services for their area, with business proposals disappearing into the PCT, without feedback, for months at a time. Given a large sheet of paper with post-it notes to record actions and star shapes to record hazards and problems, this group had more stars than actions. Recent changes in senior staff within the PCT have seen improvements in the relationships, with PBC representatives now being invited to key PCT meetings.

Working largely independently, the larger of the PBC groups has managed to develop an impressive number of service redesign proposals. Those which have already been implemented include practice based physiotherapists, community matrons, an A&E Integrated Urgent Care Service/Primary Care Assessment Centre, an Improving Access to Psychological Therapies programme and a study investigating options for Atrial Fibrillation.

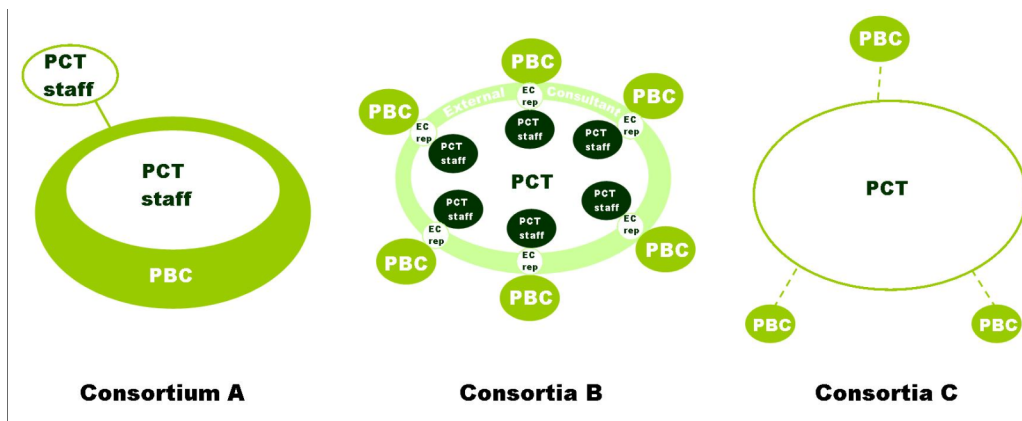


Fig. 2. Models of the different PBC structures

#### 2.4 PBC summary

These three very different models of PBC illustrate the ongoing grassroots evolution of structures and processes and the important influence of relationships of trust between the PCT and clinicians in primary care. PBC offers the potential for systemic or second order change in relation to the design of patient care pathways, but there are many barriers to be overcome. Those specifically identified in the literature and through the case studies include:

1. Data – lack of a coherent framework for recording and sharing data from primary care, hospital records, and social and economic data, mean that data is often contradictory and cannot be assembled in such a way that an accurate local assessment of healthcare services can be formed.

2. Roles and responsibilities – lack of clarity between PCT appointed WCC managers and PBC groups in some cases prevents collaborative working.
3. Lack of specific skills - both lack of clinical knowledge within PCTs and lack of business skills within PBC groups, and, in some cases, asking the wrong people to do the wrong job (PCTs to set strategy and PBC groups to implement this), rather than exploiting the relative strengths of each group.
4. Lack of levers to influence the providers – the recent introduction of CQUIN, PROMS has not yet been effectively used by PCTs or PBC groups.
5. The adversarial relationship promoted by conflicting incentives and structures in PCTs and Foundation Trusts, and lack of a framework allowing hospital based consultants to work with clinicians in primary care.
6. Limited engagement from the majority of GPs, with responsibility focused on a minority of enthusiastic GPs.
7. Failure, in most, cases to engage meaningfully with patients and public in healthcare service assessment and redesign.
8. Lack of understanding as to the most appropriate scale for PBC commissioning, balancing local knowledge and involvement with resources required for effective functioning.

It is recognised that through the introduction of PBC, GPs are more aware of the financial implication of their referral decisions, and that collaboration and cluster working offer stimulating environments for innovative solutions to healthcare service design. However, conflicting demands and capacity issues related to involvement in daily clinical practice, while attempting to fit in major service restructuring discussions mean that the potential of these cross-disciplinary, inter-organisational communities of practice has not been fully realised, as illustrated in the following comment:

“Our single greatest difficulty is squaring our day job with the time needed to give [to] PBC to make it work. In no other area of public work would something this important be staffed by people with full time jobs scrabbling to afford a half day here or there” (Department of Health 2009a).

It is clear that PBC is not yet functioning in its intended capacity as a sustainable framework for service redesign. In more developed consortia, such as Consortium A, it appears that PBC is becoming embedded in the PCT’s commissioning structure, also serving an important function as a community enterprise, involving local people and clinicians in the development of sustainable local health estates strategies. In Consortia B strategic partnerships have been developed with the

local authority and voluntary sector, whose involvement in service redesign panels ought to ensure context-appropriate, sustainable pathways for patient care. Consortia C has the advantage of a reasonable base of local involvement by GPs, and frustration with lack of support from the PCT should hopefully be overcome by the new management approach. There is clearly no 'one size fits all' model for PBC, with advantages and disadvantages associated with scale and structures of governance. With latest government guidance suggesting that GPs may soon be given 'real' budgets for commissioning (Nuffield Trust 2010), clinicians in primary care are being offered the chance to take the lead in developing local clinical partnerships, with a focus on integrated care (Smith, Wood and Elias 2009). The potential of integrated care in a community setting to offer human, social, economic, and environmental benefits, currently offer the most hope of addressing issues related to the regenerative, assimilative and adaptive capacities of the NHS as a publicly funded system of healthcare. As those with the daily experience of working in the community, primary care clinicians, if they are fully supported by the PCTs, and manage to overcome the difficulties outlined above, may be best placed to assess local needs (in partnership with their patients), and produce proposals for strategic, holistic approaches to health care and promotion.

The following section will discuss details of an in-depth study with one large GP practice in the NW, which aimed to understand how clinicians use their daily experience of working with patients to inform the redesign of services at practice level.

### **3. DESIGN IN PRACTICE**

Previous sections have indicated that innovation has been identified as an important conduit through which productivity gains, improved services and transformation of healthcare delivery might be created and delivered. This will investigate how sustainable frameworks for innovation in primary care might be enabled through the use of design tools and methods. 'Indigenous' healthcare service design skills and capacity are discussed, and some exercises involving cross fertilization from professional design are presented.

#### ***3.1 Practice D***

Practice D was formed in April 2005 through the merger of four general practices in a North West Seaside town, producing a large multi-site practice with a patient list of thirty two thousand patients, involving twenty one partners, one of the ten largest GP practices within England. Many of the patients come from areas of high deprivation and there are a high proportion of patients with complex health needs and addiction problems. The Design in Practice team has been using an action research approach with Practice D to investigate the appropriateness of bringing design tools and methods to daily processes and issues of concern to the

practice, with a view to ascertaining their effectiveness in stimulating and supporting innovation.

Two specific areas of interest were identified through dialogue with practice staff. These were improving patient engagement, and service redesign processes.

### **3.1.1 Patient Engagement**

Following significant time spent in participant observation at each practice site and interviews with practice staff, it emerged that the practice staff were interested in improving their understanding of, and interaction with, patients, over and above the existing small Patient User Group. The Design in Practice team were asked if they might take part in the Staff Development Workshop in September 2009 and conduct a workshop exploring staff perceptions of their patient needs, as a first step to considering how to improve patient engagement – one of the key principles of the practice.

After some discussion, the Design in Practice team decided to explore the use of personas as a means of probing staff perceptions of patients. Personas are commonly used by software development companies and interaction designers as a means of influencing design decisions (Grudin and Pruitt 2002; Blomquist and Arvola, 2002). Originally advocated by Cooper in 1999, personas have been proposed as a means of involving ‘virtual’ clients in the design process. Traditionally the process of persona creation involves gathering data about different clients or ‘users’ of a service, which is then used to construct a ‘type’ or ‘persona’ of a typical user of the product or service (Pruitt and Adlin, 2006). Blomquist and Arvola (2002) suggest that,

“The persona must come to life for the design team in order to reach its full potential, so that the team members are engaged in the persona and his or her goals. The personas are concrete embodiments of the needs and goals that the team designs for and they are easier to talk about, remember and get a shared view of than a list of features and an abstract description of “the user”.

A persona creation exercise with 60-70 staff in nine groups, produced a range of personas focused mainly on socially marginalised groups with low socio-economic status, and concomitant health problems. One of the doctors explained that black humour is often used by clinicians as a coping strategy, and that, given the social demographic of the area, staff do encounter a higher than average number of very demanding patients, and it is usually the worst cases that imprint on staff memory. A visualisation was produced from the results of this workshop which illustrated the characteristics of different ‘types’ of patients, with the

intention that this could be used to inform decisions about future redesign of services.

### **3.1.2 Exploring service redesign processes**

Subsequent to a staff development session where many of the reception staff asked questions regarding how to interpret patient demands for same day care, one of the partners in the practice, and the practice manager, set up a group to explore the options for redesign of the 'same day care' service. This group was titled the 'Unscheduled Care' group as, in initial discussions, it became clear that demands for same day care were not necessarily based on cases that the practice would deem 'urgent'.

Two members of the Design in Practice team sat in on weekly meetings of the Unscheduled Care team over a period of three months from October to December 2009 - observing decision making processes and negotiations in the meetings, and the development of service 'design' proposals. The group generated a protocol for referral, and the new Unscheduled Care system went live on 1<sup>st</sup> December.

As a means of evaluating how the system was functioning, the team were asked to participate in another Staff Development afternoon on 20<sup>th</sup> January 2010, and to explore further the possibility of using design tools in designing 'Unscheduled care' – that is appropriate referral of patients based on information given over the phone.

A 'design game' was developed, drawing on professional service design practice, to allow staff to investigate their differing interpretations of patient's demands for care. This provided a forum for knowledge exchange in the groups. In one group, the session functioned as a peer-to-peer learning opportunity, while the other group was more loosely structured and explored the dilemmas raised in receptionists trying to 'diagnose' a patient's problem before passing it through the system. A later session, using the same design game with a similar intent of exploring concepts of urgent care, with the practice Patient-user group, was very successful, with patients expressing satisfaction that they had been able to contribute meaningfully to the discussions regarding service redesign.

### **3.1.3 The application of design tools in practice**

Although the design tools used in the project were perceived as interesting and engaging, most staff did not see the value or relevance of the exercises to their daily practice. Although this can be attributed to the limited time available to conduct the workshops, this must also be recognised as an inherent feature of primary care practice, and means of communicating the purpose and intent of similar exercises is being explored in further dialogue with the practice.



The attempts to bring design tools into primary care have, so far, acted as ‘breaching experiments’, revealing differences in language, orientation and self-understanding of practice. While from a designer’s point of view, reconsidering patient care pathways seems very much like a service design process, from the medical staff’s perspective it is about ‘engineering’ a better service – a subtle but important difference. The staff do not conceive of themselves as ‘designers’ and are focused on finding ‘solutions’. Design methods, in contrast, look for in-depth understanding of the existing situation and visions for (systemic) change. It became apparent in the activities with staff that the medical emphasis on core competencies, protocols and processes may contribute to a prescriptive and potentially rigid approach to problem solving which clashed with the concept of divergent and emergent approaches proposed by the design team. DiMaggio and Powell (1983) and Carley and Harrald (1997) explain that protocol and process driven specialisms can lock an organisation into fixed methods of thinking, perceiving and responding to situations, which lead to smoother functioning on a daily basis, and thus to short term organisational gains, but may act as barriers to transformation and innovation in the long run.

Another perspective is provided by Bartunek and colleagues (2006) and Swan and co-authors (1999) both of whom highlight the importance of ‘shared systems of meaning’ and ‘sense-making’ to the success of cross-boundary collaborations. In attempting to explore the application of design tools as a means of fostering innovation in healthcare service design with healthcare professionals, it became apparent that exploring fundamental assumptions regarding the interpretation of words and concepts, requires the time and space for continual and evolving dialogue. The fact that the patients responded much more positively and engaged more readily with the design tools, and that staff observed this enthusiasm, may provide a lever for further discussion about the utility of design methods as a means of facilitating communication between clinicians and patients in considering service redesign. In this respect the design tools will contribute as an innovative means of promoting boundary spanning activities, and may help promote sustainable, cooperative frameworks for service redesign.

#### **4. CONCLUSION**

This paper has explored issues of sustainability in the NHS in terms of the assimilative and regenerative capacity of primary care structures to deal with predicted increasing demands and reduced resources.

Practice Based Commissioning affords an opportunity to create ‘communities of practice’ (Hildreth and Kimble 2004), but some frameworks must be developed to allow clinicians to allocate sufficient time to developing relationships and critically examining evidence related to care pathways, to ensure that innovative

local solutions emerge, and to envision and design change rather than copy-cat reproductions of publicised models of best practice. For the sustainability of PBC as a framework, it is vital that structures and processes for engaging all stakeholders in a deliberative and meaningful way are developed to validate the mandate given to PBC to bring commissioning decisions closer to the public (Mathur, Price and Austin 2008). The potential for personal healthcare budgets held by patients, replicating those already implemented in social care (Leadbeater, Bartlett and Gallagher 2008), to replace many of the functions of PBC, may depend on evaluations of the relevance and effectiveness of redesigned care pathways achieved through PBC.

In line with Lewin's unfreeze-change-refreeze model of organisational change (1958), considerable unfreezing and deconstruction of currently rigid and embedded structures, both within PCTs and at practice level, may first be necessary to provide an environment within which clinicians are empowered to envisage and consider new and innovative approaches to the design of healthcare services. Lewin's model actually functions in a continuous cycle of organisational change, where the refreeze stage consists of embedding changed attitudes, behaviours and ways of working in the organisational psyche, while continuing to challenge structures and processes in other areas. With this in mind, means of engaging a broader base of clinical support and involvement in PBC must also be investigated to ensure the relevance of PBC initiatives and their sustainability and embeddedness in general practice. As Levasseur (2001) has indicated, 'a fundamental principle of effective change management is that people support what they help to create'.

The NHSi has advocated a 'design' approach as an alternative model, more capable of producing transformational change, than traditional OD diagnostic tools (Bevan 2007). The utility of design methods and tools as enablers of innovation in general practice have been explored to a limited extent in the Design in Practice project to date, highlighting conflicting ontologies and practices. Further dialogue and open discussion between designers and clinicians is proposed as a means of creating a shared system of meaning as the basis for further collaboration in the redesign of healthcare services.

The sustainability of current structures and frameworks for service delivery in primary care in the NHS will depend on a significant and pervasive cultural shift towards a salutogenic model, embracing shared individual, political and institutional responsibility for maintaining health and wellbeing. This will require staff and patients to work together in creating a quality centred health service, engaging in the co-design of efficient, effective and equitable models of healthcare service delivery. Control and vision are needed at all levels. Design

tools and methods can make a significant contribution to this process, but require careful support for appropriation.

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