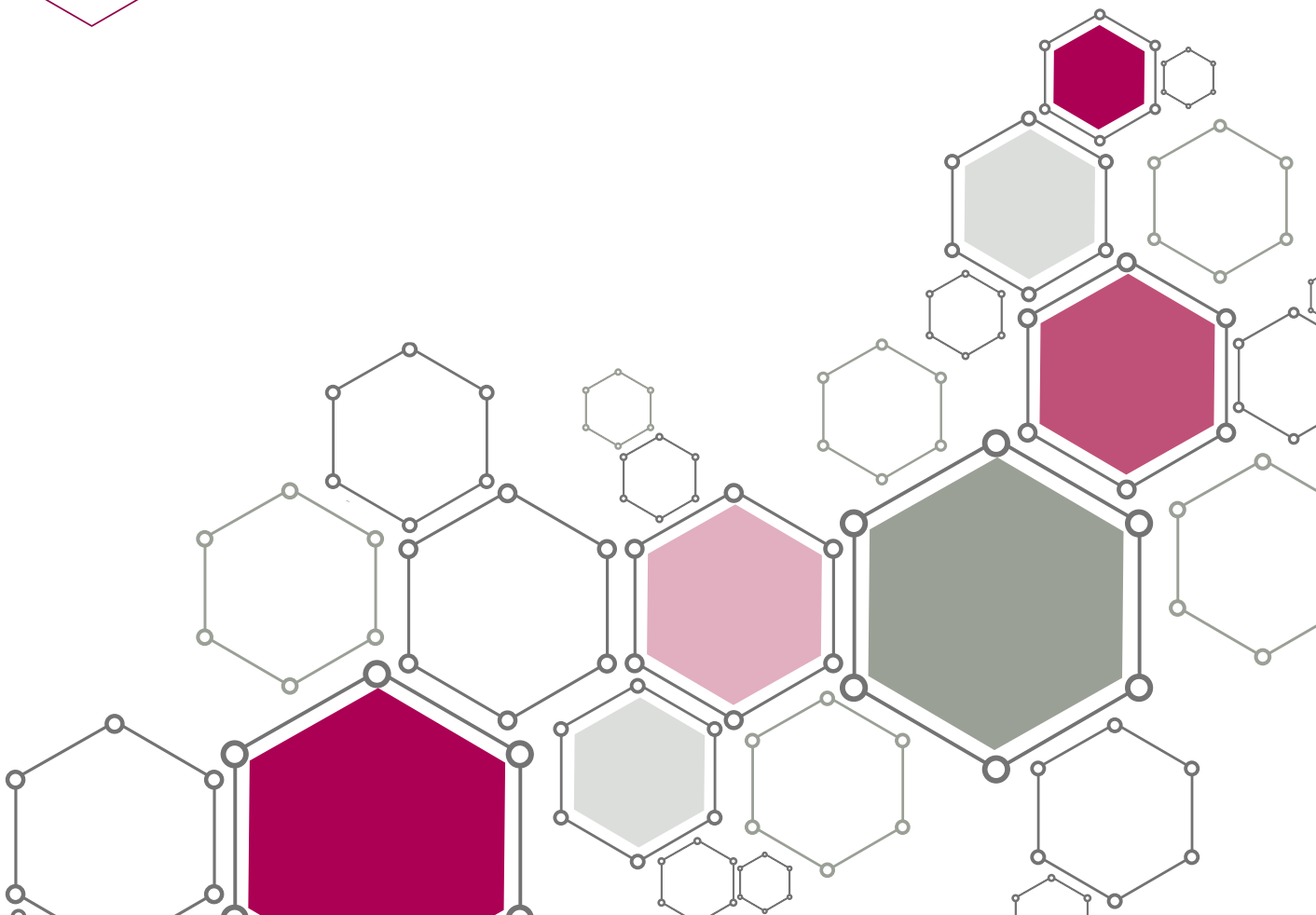
CAPITA

HEALTH AND CARE TRANSFORMATION

Successful outcomes, delivery innovation

A practical guide to establishing an integrated care system (ICS)

Part three: understanding population health management



PART ONE
INTRODUCTION: WHAT IS POPULATION HEALTH MANAGEMENT?

Capita has been involved in Sustainability and Transformation Plans (STPs) and Integrated Care System (ICS) development from the beginning. We recognise that transforming health and care system outcomes is complex. Through our engagement with NHS England and STP and Vanguard system leaders we have developed insight into the evolving ICSs and what they are learning about how to optimise health outcomes for the populations they serve. This is one of a series of publications drawing on our experience of supporting health systems across the UK in transformational change.

When we meet clients to discuss how we can deliver transformation through integrated care, population health management is invariably at the heart of the discussion, yet it is fair to say that it means different things to different people. It is both the vision – to 'optimise the health of populations over individual life spans and across generations'[1] and the *means* – a range of new competencies, technologies and methods for holding organisations to account for the health of their populations. The gap between where we are now – and acquiring the means to fulfill the *vision* – is enormous. Advice rarely discusses how to bridge the gap. Pockets of international best practice are cited as exemplars, but these depend heavily on very different institutional arrangements, cultures and history.

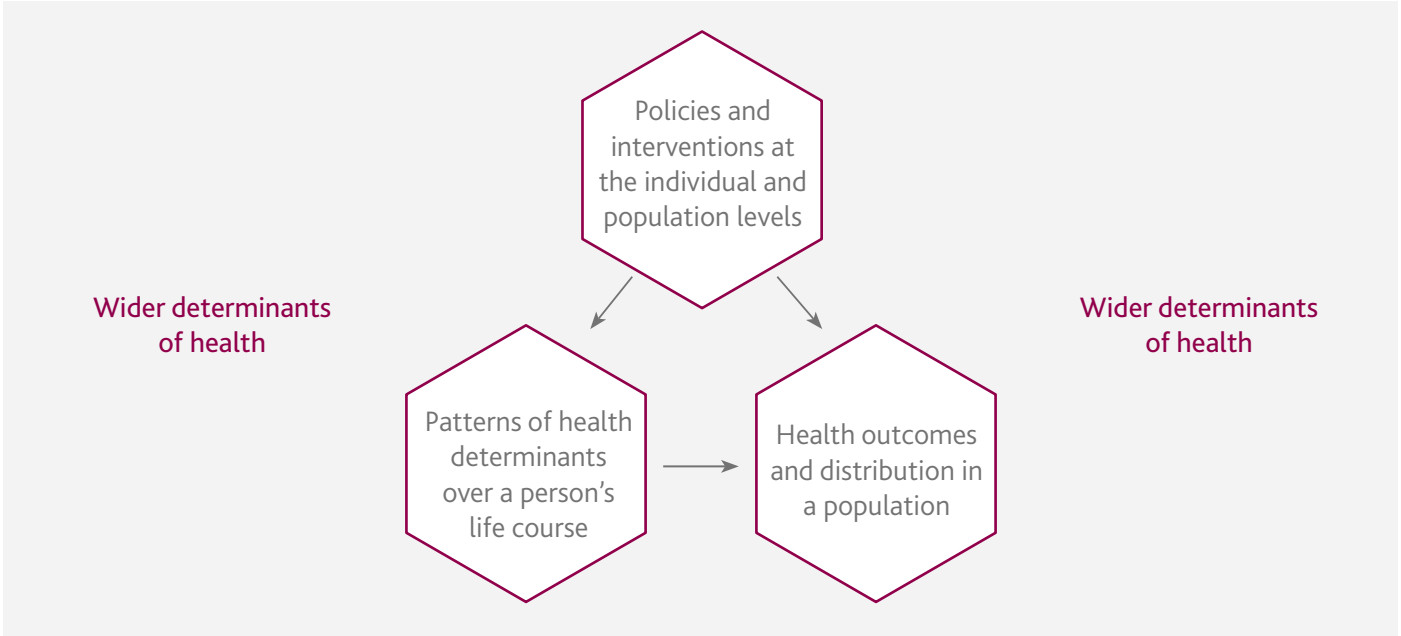
In this article, we come from a different perspective. We consider what the best systems in the UK are doing *now*. How they are making steady progress towards delivering the vision, without losing sight of their current operational imperatives. How they are systematically implementing incremental gains at scale, a key principle for establishing Integrated Care Systems that we outlined in our first two thought pieces. And most importantly, how are they going to lay firm foundations for the massive changes in working practices, behaviours and technologies needed to achieve their long-term goals.

What's new?

A commonly used definition of population health is 'the health outcomes of a group of individuals, including the distribution of such outcomes within the group'[2].

It has four elements as illustrated in the schema[3] below:

1. a focus on health outcomes as opposed to inputs, processes or services
2. an understanding of the patterns of determinants that influence these outcomes
3. a perspective that covers all the determinants of health
4. the policies and interventions that can achieve the optimal balance of resources.



Reading this you might ask how this differs from a traditional public health agenda. What is new is not the aspiration but the current circumstances. Implicit in this definition is a requirement to know what impact interventions have rather than place trust in theory or logic. In the absence of real growth funding, health economies must test theories about the impact of interventions, to ensure they really do deliver the improvements in outcomes that we expect. The focus has also shifted recently on delivering value from each intervention, which is a function of quality and cost, and not just an improvement in clinical outcomes. Only in this way can we have the confidence to reallocate resources to new care models.

The NHS no longer has the financial headroom to cover failed initiatives or experiment with new out-of-hospital interventions on the sidelines using extra funding. We need to make changes at sufficient scale to allow legacy services to reduce fixed costs and permit cash to flow to where it is most needed. We can't tinker at the margins; we need to work at scale. We can't adopt a narrow view which benefits one part of a system to the detriment of another. These circumstances put population health management centre stage.

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PART TWO
KEY CHALLENGES OF POPULATION HEALTH MANAGEMENT

Why haven't we made more progress in re-balancing resources towards prevention and health promotion? Fundamentally, we would all agree that prevention is better than cure: better in terms of patient outcomes, and probably less costly. We know that the big savings come from avoiding "failure demand" – demand that arises from failure to respond pro-actively to health risks in the population.

But the inconvenient truth is that while the logical case for change is unassailable, practical obstacles have often seemed insurmountable. Population health management involves moving from:

- acting on certainties – treating people as they present, to
- acting on predictions;
  - finding people at theoretical risk of presenting, and
  - treating them with interventions which produce hypothetical results.

It takes courage to shift resources from hard-pressed acute services to theoretically beneficial new care models based on the assumed benefits of a prevention programme and its effectiveness in reducing failure demand. This carries with it a very real short-term risk of operational difficulties in hospitals, poorer performance against key measures, and political turbulence. To date, the NHS has managed this risk by deploying pump-priming funding and growth money to avoid real reductions in acute spending. As a result, changes have tended to be small scale. These small changes deliver only limited benefits and, over time, compound to create pressure on the acute sector. Change needs to be delivered at scale to realise the shift in activity necessary to avoid the very high fixed costs faced by NHS providers.

1 Project HOPE, Framework for Population Health, 2014
2 Kindig & Stoddart, What is Population Health? 2003
3 Ibid
4 Erickson et al, Years of Healthy Life, 1995

PART THREE
WHAT HAVE THE BEST SYSTEMS LEARNED?

Let's consider then how the most advanced systems have responded to these challenges. A little over two years ago, NHS England funded evaluations into new models of care. The Vanguard sites have given feedback on progress to date at conferences this year. The National Audit Office has also issued a report[5] on the subject.

Common changes introduced by the Vanguards include:

- developing a broad vision to improve the health of all their citizens, but typically with the initial focus on long term conditions and frailty
- targeting a wide range of outcome measures, but with a strong focus on acute admissions and length of stay
- improving their understanding of their populations, using traditional tools such as Right Care packs and risk stratification to determine priorities and establish baselines
- using logic models to develop a theory of change, which in turn supports monitoring and underpins evaluation plans.

So far this may sound very familiar and hardly ground-breaking, but it is only part of the story. What's different is the challenge that the evaluations are delivering. A common message is that the logic models, which reflect the received wisdom about how things are assumed to work, are not standing up well to the evidence. Here are some examples:

- There is often a mismatch of outcome targets to cohorts; e.g., short-run improvements in urgent care admissions are expected to map directly to better management of chronic conditions.
- The trade-off between cohort morbidity and the benefits that can be achieved from an intervention has been poorly understood. Consequently, systems have targeted people with high morbidity because they can more accurately predict their risk of using healthcare services. However, they often find that the interventions don't deliver the expected benefits for the selected patient cohort or for the system.
- Resources have frequently been poorly aligned with cohort need. We see over-skilling in the new care models for some services and competency gaps in others.
- Duplication of initiatives is common, leading not only to unnecessary spending but also inefficiency and confusion in delivery.
- We are only starting to examine the critical topic of patient/user behaviour; for example, what features of a service are critical in influencing patient/user choice. This has a bearing on deflected demand, as well as additional demand for new services.

5 NAO, Developing new models of care through NHS Vanguards, 2018

PART FOUR
WHAT NEEDS TO CHANGE?

There is every reason to be optimistic. Yes, the Vanguards have, in the main, focused on 'traditional' cohorts, and not all of the interventions they have introduced are genuinely new. But we are now finding out far more about what works and why.

Embedding evaluation

Central to this – as alluded to above – is the role of evaluation. We are seeing the best Vanguard sites, for example Mid Nottingham, aspiring to 'permanent evaluation'.

> In our view, evaluation is an essential part of population health management. It needs to be seen as everybody's business, rather than the domain of academics; "business as usual", rather than one-off projects.

In line with this, there needs to be skills transfer from evaluation teams to NHS staff, to enable them to take up the reins. In our evaluations of urgent care, PACS and MCP Vanguards, we have transferred skills in qualitative evaluation such as focus groups and observation, alongside quantitative methods using free, open-source tools like R and Gretl to evaluate the impact of initiatives and determine causality. This means that, having been trained to evaluate themselves, NHS partners are not burdened with fees for external support or subscriptions. Wherever possible, we develop spreadsheet tools which incorporate our findings and allow systems to estimate activity shifts, implementation and running costs – tools like our urgent care channel shift model which we developed for NHS England through in-depth work with the urgent care Vanguards and is now freely available online.

Identifying active ingredients

In the NHS it is common to hear of a new intervention being lauded as a success in one site, only to learn that it has been abandoned in a site that pioneered the approach. An example is virtual wards, a mainstay in many Vanguards but abandoned in one of the test sites, Croydon, which launched the concept back in 2005 . There are a host of reasons why an intervention may work in one place and not in another.

One approach that successful sites are taking is to identify the critical factors or 'active ingredients' that make the difference between success and failure. These are important in determining whether an initiative will work in a different setting.

Identifying active ingredients: Reducing ambulance conveyances in Rushcliffe

In our evaluation of the Rushcliffe Principia Multi-specialty Community Provider Vanguard we carried out a deep dive evaluation of the community emergency technician scheme. This was a variant of a See and Treat initiative, whereby single-handed ambulance technicians respond to emergency calls and deliver care on the scene to avoid admission where in the patient's best interest. The distinguishing feature in Rushcliffe was that – as standard practice – the technician's assessment on the scene was combined with a phone conversation with the patient's GP, who was able to draw on the patient's history to inform joint decision making with the technician with the GP taking on the clinical risk. This conversation and joint decision making happened between the GP and the technician for all patients except those requiring clear emergency treatment, eg stroke, heart attack etc. We found that:

- the initiative improved ambulance non-conveyance rates from a baseline of 32% to 41% for patients seen by the technicians – in turn leading to reduced demand for emergency acute care.
- this reduction in ambulance conveyance meant the staff were able to spend less time travelling and in handover, and more time to respond to patient calls.

- the service is delivering its anticipated benefits, such as maintaining greater independence for patients who are supported to remain at home when it is safe for them to do so.
- 72% of GPs surveyed considered the service model to be 'beneficial' or 'very beneficial' to their patients and most considered it to be sustainable in their practice.
- the technicians have been able to improve their assessment skills as a result of the initiative, which is a considerable added benefit from both a service and staff development perspective.
- the technicians felt part of the wider primary and community team, with greater knowledge of local services and contacts to further support patients at home.

We worked closely with Rushcliffe staff to evaluate the initiative, combining qualitative techniques, such as interviews and observing the technicians in practice, with quantitative analysis and modelling. We identified that the key active ingredient was indeed the conversation with a patient's GP (which occurred in all instances except where the patient clearly needed immediate conveyance to hospital) and the resulting clinical discussion and joint decision making process between technician and GP. Key to the success of this were strong, trust-based relationships between technicians and GP practices, which Rushcliffe had worked hard to embed through strong GP leadership and the hard work of the technicians on the ground.

In many cases, the outcome was that the patient was supported to remain at home, with other services being accessed to provide care/treatment as required. This led to the significant reduction in patients being conveyed to hospital.

Using the learning from this initiative, Rushcliffe is now proposing and championing the application of this joint decision-making model to ambulance staff across the Greater Nottinghamshire STP area. While this will undoubtedly be more difficult to apply at scale across urban as well as rural areas, the initiative in Rushcliffe has proven that with strong GP clinical leadership and empowerment of the ambulance staff, significant improvements in non-conveyance are possible – delivering improved outcomes for both patients and the system.

Improving our understanding of patient/user behaviour

One area where the logic models for interventions have been shown to be particularly weak is in terms of simplistic assumptions about how patients and users will respond to change. This is not a simple matter of theorising without data.

When Vanguards planned new services or interventions they often consulted the public and found high levels of support for introducing them. Patient/user surveys conducted since the services opened are generally very favourable. This would seem to validate the case made in the logic models that patients will shift from using hospital-based services to the new care models. Moreover, our evaluations often found that the services were well utilised and that the acuity of the users is in line with expectations.

When we look at the impact on hospital care, however, we get a shock. There is no discernible drop in demand pressure. This is confirmed by sophisticated analysis of attendance and admission data, where we control for confounding factors and trends. How can this be?

The reason is that the above approach takes no account of user behaviour. For example:

- We need to know whether the service will stimulate new demand. After all, in any other business, a more accessible, responsive and integrated service would be expected to increase demand.
- For low acuity service users, who are not referred to a service by a clinician, we need to know what features a new service needs to have for them to choose it in preference to hospital.
- For higher acuity users, who are being provided with support to self-manage more of their care, we need to know whether they have the confidence and determination to respond positively.

The best sites have learnt that standard patient surveys don't go into enough depth, since they measure only general satisfaction. Some sites are therefore starting to base their activity projections on more probing questions and are supplementing surveys with other sources such as discreet choice analysis and patient activation measures.

CONCLUSION

Population health management is very challenging to implement. We should not compromise the vision to optimise the health of populations over individual lifespans and across generations. However, the most successful systems take an incremental approach. They embed a permanent evaluation culture, working to improve their competencies and adopt new techniques and technologies, thereby building transformation on solid foundations.

Our experience in working with the Vanguard sites from the beginning has confirmed our view that there is no silver bullet for Integrated Care Systems. System transformation can only be delivered by collaboratively focussing on the interventions that work, and systematically scaling them over time. The focus needs to be on systematic, incremental change rather than big-bang transformation – starting with the things you know you can influence and you know have impact.

Our assisted transformation support is designed to help systems make incremental change towards genuinely integrated care.

We can provide support through the whole transformation journey. We have the tools and expertise to get you started, and our support can grow at a pace that suits you.

To discuss the issues raised in this article and how we can support you, please contact:

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