The Evidence Base for Integrated Care

Nick Goodwin and Judith Smith
Key questions

› What do we mean by integrated care?
› What problem does integrated care seek to address?
  - Who is integrated care for?
› Examples of integrated care
› Why is integrated care such a challenge?
  - Key barriers to developing integrated care
  - Competition, choice and integrated care
› What can be done to support integrated care?
  - Applying ‘tools’ to support integrated care
  - Targeting and managing population groups
  - Aligning system incentives
› What does this experience tell us about adopting and mainstreaming integrated care ‘at scale’?
  - The successful components of an integrated care strategy
› How can success be defined and measured?
What do we mean by ‘integrated care’?
A new idea?

The idea is not new – concern about lack of integrated care dates back to before the start of the NHS.

This concern has been about fractures in systems and delivery that allow individuals to ‘fall through the gaps’ in care – eg, primary/secondary care, health/social care, mental/physical health care.

Approaches that seek to address fragmentation of care are common across many health systems, and the need to do so is increasing as more people live longer and with complex co-morbidities.
Integrated care is centred around the needs of users

Integrated care means different things to different people

‘The patient’s perspective is at the heart of any discussion about integrated care. Achieving integrated care requires those involved with planning and providing services to impose the patient’s perspective as the organising principle of service delivery’ (Shaw et al 2011, after Lloyd and Wait 2005)
Integration and Integrated Care

**Integration** is the combination of processes, methods and tools that facilitate integrated care.

**Integrated care** results when the culmination of these processes directly benefits communities, patients or service users – it is by definition ‘patient-centred’ and ‘population-oriented’

**Integrated care** may be judged successful if it contributes to better care experiences; improved care outcomes; delivered more cost effectively

‘Without integration at various levels [of health systems], all aspects of health care performance can suffer. Patients get lost, needed services fail to be delivered, or are delayed, quality and patient satisfaction decline, and the potential for cost-effectiveness diminishes.’

(Kodner and Spreeuwenbur, 2002, p2)
Key forms of integrated care

- Integrated care between health services, social services and other care providers (horizontal integration)
- Integrated care across primary, community, hospital and tertiary care services (vertical integration)
- Integrated care within one sector (e.g., within mental health services through multi-professional teams or networks)
- Integrated care between preventive and curative services
- Integrated care between providers and patients to support shared decision-making and self-management
- Integrated care between public health, population-based and patient-centred approaches to health care
  - This is integrated care at its most ambitious since it focuses on the multiple needs of whole populations, not just to care groups or diseases

Source: adapted from International Journal of Integrated Care
Perspectives Shaping Integrated Care

(Shaw et al 2011, p 13)
Types of Integration

Figure 1 Fulop’s typologies of integrated care (from Lewis et al 2010)

- Organisational integration, where organisations are brought together formally by mergers or through ‘collectives’ and/or virtually through co-ordinated provider networks or via contracts between separate organisations brokered by a purchaser.

- Functional integration, where non-clinical support and back-office functions are integrated, such as electronic patient records.

- Service integration, where different clinical services provided are integrated at an organisational level, such as through teams of multidisciplinary professionals.

- Clinical integration, where care by professionals and providers to patients is integrated into a single or coherent process within and/or across professions, such as through use of shared guidelines and protocols.

- Normative integration, where an ethos of shared values and commitment to co-ordinating work enables trust and collaboration in delivering health care.

- Systemic integration, where there is coherence of rules and policies at all organisational levels. This is sometimes termed an ‘integrated delivery system’.

Source: Adapted from Fulop et al (2005)
Intensity of integration

(Shaw et al 2011, p15; after Leutz 1999)
Matching client needs with approaches to integrated care

The intensity with which organisations and services need to integrate with each other depends on the needs of the client. Full (organisational) integration works best when aimed at people with severe, complex and long-term needs. (Leutz 1999)

<table>
<thead>
<tr>
<th>Client needs</th>
<th>Linkage</th>
<th>Co-ordination</th>
<th>Full integration</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>SEVERITY</strong></td>
<td>Mild to moderate</td>
<td>Moderate to severe</td>
<td>Moderate to severe</td>
</tr>
<tr>
<td><strong>STABILITY</strong></td>
<td>Stable</td>
<td>Stable</td>
<td>Unstable</td>
</tr>
<tr>
<td><strong>DURATION</strong></td>
<td>Short to long-term</td>
<td>Short to long-term</td>
<td>Long-term to terminal</td>
</tr>
<tr>
<td><strong>URGENCY</strong></td>
<td>Routine/non-urgent</td>
<td>Mostly routine</td>
<td>Frequently urgent</td>
</tr>
<tr>
<td><strong>SCOPE OF NEED</strong></td>
<td>Narrow to moderate</td>
<td>Moderate to broad</td>
<td>Broad</td>
</tr>
<tr>
<td><strong>SELF-DIRECTION</strong></td>
<td>Self-directed</td>
<td>Moderate self-directed</td>
<td>Weak self-directed</td>
</tr>
</tbody>
</table>
Many approaches to integration

Integration can be undertaken between organisations, or between different clinical or service departments within and between organisations.

Integration may focus on joining up primary, community and hospital services (‘vertical’ integration) or involve multi-disciplinary teamwork between health and social care professionals (‘horizontal’ integration).

Integration may be ‘real’ (ie, into a single new organisation) or ‘virtual’ (ie, a network of separate providers, often linked contractually).

Integration may involve providers collaborating, but it may also entail integration between commissioners, as when budgets are pooled.

Integration can also bring together responsibility for commissioning and provision. When this happens, clinicians and managers are able to use budgets either to provide more services directly or to commission these services from others: so-called ‘make or buy’ decisions.

(Curry and Ham 2010)
Integration without care co-ordination cannot lead to integrated care

Effective care co-ordination can be achieved without the need for the formal ('real') integration of organisations. Within single providers, integrated care can often be weak unless internal silos have been addressed. **Clinical and service integration matters most.**
What problems does integrated care seek to address?
Who is integrated care for?

- Integrated care is an approach for any individuals where gaps in care, or poor care co-ordination, leads to an adverse impact on care experiences and care outcomes.
- Integrated care is best suited to frail older people, to those living with long-term chronic and mental health illnesses, and to those with medically complex needs or requiring urgent care.
- Integrated care is most effective when it is population-based and takes into account the holistic needs of patients. Disease-based approaches ultimately lead to new silos of care.
The Mrs Smith test...

Many people with mental, physical and/or medical conditions are at risk of long hospital stays and/or commitment to long-term care in a nursing home.

Mrs Smith is a fictitious women in her 80s with a range of long-term health and social care problems for which she needs care and support.

Mrs Smith encounters daily difficulties and frustrations in navigating the health and social care system.

Problems include her many separate assessments, having to repeat her story to many people, delays in care due to the poor transmission of information, and bewilderment at the sheer complexity of the system.
From a fragmented set of health and social care services ...
... to a co-ordinated service that meets her needs
Examples of Integrated Care

To illustrate who integrated care is for, the following slides look at some key care groups to whom integrated care is most suitable. Examples of integrated care from around the UK are provided to illustrate how integrated care has been achieved.
Integrated care for frail older people

Torbay Care Trust

Integrated health and social care teams, using pooled budgets and serving localities of around 30,000 people, work alongside GPs to provide a range of intermediate care services. By supporting hospital discharge, older people have been helped to live independently in the community. Health and social care co-ordinators help to harness the joint contributions of team members.

The results include reduced use of hospital beds, low rates of emergency admissions for those over 65, and minimal delayed transfers of care.

(Thistlethwaite 2011)

North Somerset

As one of 29 sites involved in the Department of Health Partnership for Older People Project (POPP), four fully integrated and co-located multi-disciplinary teams provide case management and self-care support to older people. The aim is to prevent complications in diseases and deterioration in social circumstances.

Based around clusters of GP practices, the service brings together community health and social care workers, community nurses, adult social care services, and mental health professionals.

(Windle et al 2010)
Integrated care for people with a chronic disease

Diabetes care in Bolton

In Bolton, a community-based diabetes network supports the management of diabetic patients with severe and complex needs. Care is based within a Diabetes Centre that hosts a multi-disciplinary specialist care team, but this team also reaches in to the local hospital for inpatient care, and out into general practices to support consultations. Patients and staff have reported high satisfaction with the community-based service and, in 2005/6, Bolton achieved the lowest number of hospital bed days per person with diabetes in the Greater Manchester area.

(NHS Alliance 2007)

Rheumatology care in Oldham

The Pennine Musculoskeletal (MSK) Partnership provides an integrated multi-disciplinary service in rheumatology, orthopaedics, and chronic pain. Led by consultant rheumatologists, the team employs a clinical assessment nurse, specialist rheumatology nurses, physiotherapists, occupational therapists, orthopaedic consultants, liaison psychiatrists, and podiatric surgeons. Pennine MSK is able to triage patients within 24 hours, has low waiting times for assessment (over 80 per cent now within one to three weeks), and most patients are seen and discharged from the service within seven weeks.

(Pennine Partnership MSK Ltd 2011)
Integrated care for people living with multiple long-term health and social care needs

Hereford

An integrated care organisation

In Hereford, an integrated care organisation based on eight health and social care neighbourhood teams is in development to support the personal health, well being and independence of frail older people and those with chronic illnesses such as diabetes, stroke and lower back pain.

Early successes include lower bed utilisation and reductions in delayed discharges from hospitals.

(Woodford 2011)

Wales

Chronic Care Demonstrators

In Wales, three Chronic Care Management (CCM) Demonstrators in Carmarthenshire, Cardiff and Gwynedd Local Health Boards have pioneered co-ordinated care for people with multiple chronic illness. By employing a ‘shared care’ model of working between primary, community, secondary and social care the three demonstrators were able to reduce the total number of bed days for emergency admissions for chronic illness by 27%, 26% and 16.5% between 2007-2009. This represented an overall cost-reduction of £2,224,201.

(NHS Wales 2010)
Integrated care for people with urgent and/or medically complex problems

Stroke care in London

Implementation of a pan-London stroke care pathway and the development of eight hyper-acute stroke units has improved access and reduced length of stay in hospitals. 85 per cent of high-risk patients who have had a transient ischaemic attack are treated within 24 hours, compared with a national average of 56 per cent, and 84 per cent of patients spend at least 90 per cent of their time in a dedicated stroke unit, compared to a national average of 68 per cent.

(Ham et al 2011).

Bolton’s urgent care dashboard

NHS Bolton’s GP urgent care dashboard provides an analytical tool that tracks attendance patterns in real-time from multiple sources including A&E, walk-in centres and out-of-hours services.

The approach helps clinicians mobilise more appropriate care and support to ensure patients access the most appropriate urgent care services. In 2009, A&E admissions fell 3% against a regional increase of 9%. Unscheduled hospital admissions fell 4%.

(Imison et al 2011)
Integrated care for those at the end-of-life

Cambridgeshire ICO Pilot

One of the Department of Health’s integrated care organisation pilots, it has sought to establish a model of integrated primary, secondary and community health services delivering end-of-life care across East and South Cambridgeshire and Cambridge City.

The key aims of the pilot have been to enable people to die in their place of choice, with end-of-life care tools being used across partner organisations.

Liverpool Care Pathway

The Liverpool Care Pathway seeks to integrate the variety of care inputs that an individual is likely to experience in the final days and hours of life. It helps guide care professionals in continuing medical treatment, discontinuing treatment, and initiating comfort measures.

The pathway has been used in hospitals, hospices, care homes, and patients’ own homes as well as in other community settings. For example, it was used by United Lincolnshire Hospital Trust as a tool for managing patients nearing the end of their lives in the acute setting.
Why is integrated care such a challenge?
Integrated care does not evolve naturally – it needs to be nurtured

- Integrated care does not appear to evolve as a natural response to emerging care needs in any system of care whether this be planned or market-driven.
- There is no evidence, therefore, that clinical and service integration in England is any more or any less likely to succeed than in countries without a purchaser-provider split such as Scotland or New Zealand.
- Achieving the benefits of integrated care requires strong system leadership, professional commitment, and good management.
- Systemic barriers to integrated care must be addressed if integrated care is to become a reality.

(Ham et al 2011)
Key organisational and management barriers

- Bringing together primary medical services and community health providers around the needs of individual patients
- Addressing an unsustainable acute sector
- Developing capacity in primary care to take on new services
- Managing demand and developing new care models
- Establishing effective clinical leadership for change
- Overcoming professional tribalism and turf wars
- Addressing the lack of good data and IT to drive integration, e.g., in targeting the right people to receive it
- Involving the public and creating a narrative about new models of care
- Establishing new forms of organisation and governance (where these are needed)
- Learning from elsewhere in the UK and overseas

(Ham and Smith, 2010; Goodwin 2011)
Key challenges for health and social care integration

› Scale and pace of change could undermine local achievements in integrated care
› Clinical commissioners commitment to integrated care
› Strength of health and wellbeing boards to promote integration and exert influence/leadership
› Whether financial pressures will promote the shared planning and use of resources
› Whether three separate outcomes frameworks (right) will offer sufficient incentives for aligning services around the needs of people rather than organisations.

(Humphries and Curry 2011)
Key policy barriers

- Payment policy that encourages acute providers to expand activity within hospitals (rather than across the care continuum)
- Payment policy that is about episodes of care in a particular institution (rather than payment to incentivise integration, such as payments for care pathways and other forms of payment bundling)
- Under-developed commissioning that often lacks real clinical engagement and leadership
- Policy on choice and competition
- Regulation that focuses on episodic or single-organisational care
- Lack of political will to support changes to local care, including conversion or closure of hospitals

(Ham and Smith 2010; Ham et al 2011)
Competition, choice and integrated care

- Reform policies to increase choice and competition in the NHS may impede the development of integrated care.
- There will be a need for a nuanced approach by Monitor as it develops its approach to regulating for both competition and collaboration.
- Competition could be promoted within integrated systems, and choice could be made between them.
- Clinical commissioning groups will need support and advice about how to commission for integrated care, share risks and rewards, etc.
- NHS Commissioning Board and Monitor will need a new payment policy and adopt new contract currencies to incentivise integrated care.
- There is a need for experimentation, innovation, and permission for these to take place as reforms progress.

(Hawkins 2011; Ham et al 2011)
What can be done to support integrated care?
Investing and applying the tools of integrated care

There are many different ways in which professionals and providers can work directly with communities, patients/clients to support integrated care. These ‘tools’ of integrated care focus on the ‘how’ of clinical and service integration.

Examples of tools for clinical or professional integration:

• Case finding and use of risk-stratification
• Standardised diagnostic and eligibility criteria
• Comprehensive joint assessments
• Joint care planning
• Single or shared clinical records
• Decision support tools such as care guidelines and protocols
• Technologies that support continuous and remote patient monitoring
• Peer review

Examples of tools for service integration:

• Care co-ordination
• Case management
• Disease management
• Centralised information, referral and intake
• Multi-disciplinary teamwork
• Inter-professional networks
• Shared accountability for care
• Co-location of services
• Discharge/transfer agreements
• Personal health budgets

The King’s Fund

Ideas that change health care

Nuffield Trust
evidence for better health care
Investing and applying the tools of integrated care – case example

The **North Lanarkshire Health and Care Partnership** brings together the work of North Lanarkshire Council and NHS Lanarkshire to deliver better integrated services to four care groups: older people, and those with disabilities, addictions and mental health problems.

Clinical integration has focused on aligning the goals and working practices of health and social care professionals in order to deliver better care co-ordination and improve care outcomes.

Key tools for clinical integration used in North Lanarkshire included:
- multi-professional team-working between health and social care
- organisational development work to develop shared goals and values
- the creation of shared outcome measures
- care co-ordination targeted at the highest risk individuals with the most complex problems
- involvement of community teams and organisations in ongoing care and support

(Rosen et al 2011)
Targeting and managing populations

Strategies to apply integrated care often focus on particular groups of patients or populations, whether classified by age, condition, or some other characteristic such as public health need. Frail older people, and/or those with long-term conditions, are typical targets.

‘Population management’ refers to the strategic activity of pro-actively identifying individuals in these groups, usually those at risk of a deterioration in their health or at risk of institutionalisation. Where interventions are appropriately targeted, there is evidence that care quality can be improved.

Examples include:

- health and social care teams providing co-ordinated care to frail older people, such as in Torbay (above)
- ‘virtual wards’ providing home-based case management to high-risk individuals and led by community matrons, such as in Croydon and Wandsworth
- disease management programmes focusing on people with specific conditions such as diabetes, heart failure or COPD
- managed networks that strengthen co-ordination of care for people with specific health and social care needs (eg, learning disabilities and neurological disorders)

(Goodwin et al 2010)
Case finding: predicting those at risk

The accurate identification of individuals appropriate for an integrated care intervention is crucial to the success of any population management programme. Without a reliable method of stratifying people into risk groups it is likely that care will be targeted at those people who either do not need it, and potentially miss those who do. Predictive risk tools are increasingly being employed in the NHS, and there is potential to extend the approach to social care. As well as its role in case finding, the approach can be used to allocate resources across a population, and for performance management and evaluation purposes.

(Nuffield Trust 2011)
Aligning system incentives

At a ‘macro’ level, integrated delivery systems bring together providers, potentially with commissioners, to take on responsibility for the full spectrum of services to the populations they serve. These organisations seek to align system incentives – regulatory, accountability, financial – and promote a common set of values that help to create a platform through which integrated care ‘at scale’ can flourish across whole populations.

They are sometimes referred to as ‘accountable care organisations’ where providers and their employees take on some of the financial risk in managing health care budgets alongside responsibility for care quality and care outcomes to the populations which they serve.
Integrated care at the macro-level

Example 1:

- **Kaiser Permanente**, a virtually integrated system serving 8.7 million people in eight regions. Health plans, hospitals and medical groups in each region are distinct organisations linked through contracts. A key feature of the Kaiser Permanente model is the emphasis placed on keeping members healthy and achieving close co-ordination of care between providers through the use of electronic medical records and teamworking.

  Curry and Ham (2010)
Integrated care at the macro-level

Example 2:

Veterans Health Administration employs medical staff and owns and runs hospitals to manage the full range of care to veterans within a budget allocated by the federal government. It operates through 21 regionally based integrated service networks that receive capitated funding. There is rigorous performance management centred on key markers of clinical quality and outcomes that incentivise home-based care and care co-ordination for people with chronic illness.

Curry and Ham (2010)
Example 3:

- **Integrated Medical Groups** in the US bring together primary, secondary and specialist physicians to take on a budget with which to provide and commission all or some services required by the populations they serve. By integrating physician services around the patient, and using key tools such as electronic medical records and peer review processes, studies have shown that inappropriate admissions to hospitals can be reduced and lengths of stay cut.

  Curry and Ham (2010)
Integrated care at the macro-level

Example 4:

† **San Marino**, a republic of 30,000 people on the Italian peninsula, integrates health and social care at an organisational and professional level using a single budget. Care professionals work in multi-disciplinary teams and take both individual and group accountability for service delivery (such as for joint assessment, planning, care management, and care outcomes). Investment is made in the services and skills required to support integrated care, including the fostering of an organisational culture to overcome individual professional interests. San Marino has been rated as one of the best care systems in the world by the WHO due to its combination of high life expectancy, low per capita spend, and comprehensive coverage.

Pasini (2011)
Aligning incentives requires integrative processes as the ‘glue’ between teams and organisations.

Figure 1: Interactions between integrative processes

Source: Integration in Action. Rosen et al. 2011
The importance of leadership

- Professional leaders play a central role in the success of integrated care.
- Effective leaders are usually characterised by their sustained long-term commitment, enthusiasm and involvement to integrated care locally, and the trust and respect given by their peers that has built up over time.
- Leaders need the skills and strategies necessary to understand, influence and lead the local agenda in the design, commissioning and delivery of integrated care. The range of roles includes:
  - identifying and demonstrating the core values and purpose that underpin approaches to integration
  - building a common vision and goals between care partners
  - engaging professionals, developing good relationships, and building commitment, understanding and a shared culture
  - maintaining a clear vision communicating this clearly to staff and users
  - driving quality improvements, for example through benchmarking performance and peer-review
- Leaders in the NHS, local government and the third sector must take the initiative and promote integrated care, rather than adopt a fortress mentality focusing on the survival of their organisations.
- Leaders need to work together across a health community to achieve financial and service targets.  
  
  (Ham et al 2011; Rosen et al 2011)
Key issues in creating an enabling policy environment for integrated care

- Have a **regulatory framework** that encourages integration and integrated care
- Have a **financial framework** that encourages integrated care
- Provide **support to innovative approaches to commissioning** integrated services
- Apply **national outcome measures** that encourage integrated service provision
- Invest in continuous **quality improvement** including publishing the use of outcome data for peer review and public scrutiny

(Goodwin *et al* 2011; Rosen *et al* 2011)
What does this experience tell us about adopting and mainstreaming integrated care ‘at scale’?
The core components of a successful integrated care strategy (1)

- **Defined populations** that enable health care teams to develop a relationship over time with a ‘registered’ population or local community, and so to target individuals who would most benefit from more co-ordinated approach to the management of their care.

- **Aligned financial incentives** that: support providers to work collaboratively by avoiding any perverse effects of activity-based payments; promote joint responsibility for the prudent management of financial resources; and encourage the management of ill-health in primary care settings that help prevent admissions and length of stay in hospitals and nursing homes.
The core components of a successful integrated care strategy (2)

› **shared accountability for performance** through the use of data to improve quality and account to stakeholders through public reporting

› **information technology** that supports the delivery of integrated care, especially via the electronic medical record and the use of clinical decision support systems, and through the ability to identify and target ‘at risk’ patients

› **the use of guidelines** to promote best practice, support care co-ordination across care pathways, and reduce unwarranted variations or gaps in care
The core components of a successful integrated care strategy (3)

› A **physician–management partnership** that links the clinical skills of health care professionals with the organisational skills of executives, sometimes bringing together the skills of purchasers and providers ‘under one roof’

› **Effective leadership** at all levels with a focus on continuous quality improvement

› A **collaborative culture** that emphasises team working and the delivery of highly co-ordinated and patient-centred care
The core components of a successful integrated care strategy (4)

› **Multispecialty groups** of health and social care professionals in which, for example, generalists work alongside specialists to deliver integrated care

› **Patient and carer engagement** in taking decisions about their own care and support in enabling them to self-care – ‘no decision about me without me’
How can success be defined and measured?
What evidence do we already have?

- Research into structures and processes, or specific aspects of chronic disease management (eg, Shortell 2009)
- Evidence that integrated care programmes have a positive effect on quality (eg, Ouwens et al 2005)
- Evidence of high performance by US integrated delivery systems (eg, Asch et al 2004; Feachem et al 2002)
- Some emerging UK and international evidence about outcomes (eg, Ham and Curry 2010; Rosen et al 2011)
- Some emerging UK and international evidence about efficiency, but more studies needed
What evidence do we need?

- Impact on patient experience, including the development of ‘markers’ for improved processes of care
- Impact on use of services, especially inpatient beds
- Impact on costs, and differentially on different parts of the system
- **Impact on outcomes**, with markers developed
  (Ramsay, Fulop and Edwards 2009)
Take home messages (1)

- Integrated care is best understood as a strategy for improving patient care
- The service user is the organising principle of integrated care
- One form of integrated care does not fit all
- Organisational integration is neither necessary nor always sufficient. Virtual or contractual integration can deliver many benefits
- Clinical or service integration matters most
Take home messages (2)

- Start by integrating from the bottom up
- Develop a systemic framework that aligns incentives so integrated care locally can be enabled, supported and driven
- Use a range of tools to support integrated care
- Undertake evaluation and build in quality improvement - it is only possible to improve what you measure
- Better care experiences, improved care outcomes, delivered more cost-effectively are the keys by which integrated care should be judged
Resource Pack (1)


Resource Pack (2)


International Journal of Integrated Care www.ijic.org.uk


Resource Pack (3)

NHS Wales (no date) Chronic conditions management demonstrators [on-line]. Available at: http://www.ccmdemonstrators.com/


